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HAROLD LEGGETT, PH.D.
SECRETARY

State of Louisiana
DEPARTMENT OF ENVIRONMENTAL QUALITY
ENVIRONMENTAL SERVICES

Certified Mail No.

Activity No.: PER20080001
Agency Interest No. 126578

Mr. David V. Wise
Plant Manager
PO Box 358
Addis, LA 70710-0358

RE: Part 70 Operating Permit, Shintech Louisiana LLC - Shintech Plaquemine Plant 1
Shintech Louisiana LLC, Plaquemine, Iberville Parish, Louisiana

Dear Mr. Wise:

This is to inform you that the permit modification for the above referenced facility has been approved under LAC 33:III.501. The permit is both a state preconstruction and Part 70 Operating Permit. The submittal was approved on the basis of the emissions reported and the approval in no way guarantees the design scheme presented will be capable of controlling the emissions as to the types and quantities stated. A new application must be submitted if the reported emissions are exceeded after operations begin. The synopsis, data sheets and conditions are attached herewith.

It will be considered a violation of the permit if all proposed control measures and/or equipment are not installed and properly operated and maintained as specified in the application.

Operation of this facility is hereby authorized under the terms and conditions of this permit. This authorization shall expire at midnight on the 27th of July, 2010, unless a timely and complete renewal application has been submitted six months prior to expiration. Terms and conditions of this permit shall remain in effect until such time as the permitting authority takes final action on the application for permit renewal. The permit number and agency interest number cited above should be referenced in future correspondence regarding this facility.

Done this _____ day of _____, 2008.

Permit No.: 1280-00118-V1

Sincerely,

Cheryl Sonnier Nolan
Assistant Secretary
CSN:ALR
c: EPA Region VI

AIR PERMIT BRIEFING SHEET
AIR PERMITS DIVISION
LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

Shintech Louisiana LLC – Shintech Plaquemine Plant 1

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Shintech Louisiana LLC

Plaquemine, Iberville Parish, Louisiana

I. Background

Shintech Louisiana LLC is currently constructing a PVC production facility named Shintech Plaquemine Plant 1. The Shintech Louisiana LLC – Shintech Plaquemine Plant 1 is currently permitted under Permit No. 1280-00118-V0, issued July 27, 2005.

This is the Part 70 operating permit for the facility.

II. Origin

A permit application and Emission Inventory Questionnaire were submitted by Shintech Louisiana LLC on February 29, 2008 requesting a Part 70 operating permit. Additional information dated May 28, 2008 was also received.

III. Description

Shintech Plaquemine Plant 1 (SPP-1) is a vertically integrated polyvinyl chloride (PVC) manufacturing facility that also produces intermediate products, including chlorine (and caustic soda as a byproduct), ethylene dichloride (EDC), and vinyl chloride monomer (VCM). Process units include a chlor-alkali unit (C/A unit), a VCM unit, and a PVC unit. The C/A units use brine to produce chlorine (Cl_2) and sodium hydroxide (NaOH) by membrane-based electrolysis process. The VCM unit produces EDC by reacting ethylene and chlorine in a direct chlorination. The EDC is purified by distillation and sent to cracking furnaces to yield VCM and hydrochloric acid (HCl). The VCM is purified and sent to storage spheres. EDC that was not cracked is sent back to the EDC purification trains. HCl is recovered and used in a second EDC formation process called oxyhydrochlorination. Purified VCM is polymerized to form PVC.

Construction of SPP-1 is nearing completion; however, the plant has not begun normal operation. Shintech has identified several items in the permit that should be reconciled prior to startup of the facility. A reconciliation of Permit Nos. 1280-00118-V0 and PSD-LA-709 was requested to incorporate these items. This reconciliation does not change the Nonattainment New Source Review (NNSR) and PSD Best Available Control Technology (BACT) analysis of the original permitting. No further analyses are needed for this action.

Shintech requests the following changes and corrections to Permit No. 1280-00118-V0 and PSD Permit PSD-LA-709.

1. Emission Points – Based on design changes during the construction process, Shintech

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requests the addition of new emission points and modifications to existing emission points as outlined below. The changes requested below have been incorporated into the air dispersion modeling report submitted to the LDEQ on February 12, 2008.

- 1.1 Increase design capacity of cooling tower Emission Point Number (EPN) M-7 (EQT012) VCM Cooling Tower 1 from 80,000 gpm to 106,000 gpm.
- 1.2 Remove cooling tower EPN M-8 (EQT013) VCM Cooling Tower 2 from the permit. This cooling tower will not be constructed.
- 1.3 Revise stack parameters of EPN M-11 (EQT008) Laboratory Hoods.
- 1.4 Revise EPN M-12 (FUG002) VCM Unit Fugitive Emissions based on current plant conditions.
- 1.5 Include emissions for equipment opening during turnaround as an emission point, instead of GCXXVII activities.
- 1.6 Include three new loading hoppers: EPN P-25 IB Loading Hopper, P-26 IC Loading Hopper, and P-27 IFS Loading Hopper
- 1.7 Include various Firewater pumps and emergency generators. Shintech will maintain miscellaneous diesel-fired equipment at the facility for use during emergencies, such as a power outage to a main pump or unit, by adding EPN M-16 VCM Emergency Generators, EPN P-28 Emergency Combustion Equipment, EPN U-7 South Tank Yard Fire Water Pump, EPN U-8 North Yard Fire Water Pump, EPN U-9 Ship Dock Emergency Pump, EPN U-10 Utility Emergency Generator, and EPN C-6 C/A Emergency Generator. These engines will be fired at reduced loads periodically for routine maintenance and will be fired at full load for emergencies and power outages.
- 1.8 Revise design flow rate of the EPN C-2 (EQT002) HCl Scrubber.
2. Revise Insignificant Activities list.
3. Updated emission rates for the General Condition XVII Activities.
4. Update the Emission Rate Tables.
5. Miscellaneous Equipment Updates – Based on Changes in final design and construction.

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These design changes do not affect the potential emissions from the point sources to which they vent; however, they must either be incorporated into or modified in the permit since various regulatory requirements may apply. These equipment modifications are as follows:

- 5.1 Rename EQT062 as MCL-231 Process Area Wastewater/Storm Water Stripper 1 and rename EQT063 as MCL-232 (EQT063) Process Area Wastewater/Storm Water Stripper 2
- 5.2 Rename EQT 064 as MCL-631 Process Area Wastewater Stripper 1 and rename EQT065 as MCL-632 Process Area Wastewater Stripper 2. These process wastewater strippers will be designated Group 2 Wastewater under 40 CFR 63 Subparts F and G.
- 5.3 Add MCL-633 and MCL-634 – Acid Recovery Wastewater Stripper 1 and Acid Recovery Wastewater Stripper 2. These strippers were inadvertently omitted from the Title V and PSD permit applications. These process wastewater strippers will be designated Group 2 Wastewater under 40 CFR 63 Subparts F and G.
- 5.4 Add MTK-501 – Waste Feed Tank in this permit. This tank is associated with waste feed to the hydrochloric acid production furnace, which will be permitted separately. However, Shintech requests that this feed tank be included with the SPP-1 Title V and PSD permits since it vents to the thermal oxidizers (TRT001 and TRT002).
6. Amendments and corrections to Specific Requirements – Shintech has noted various regulatory applicability errors in the Specific Requirements portion of the Title V permit and seeks to reconcile these inconsistencies prior to facility startup. Revision of these requirements duplicated in the PSD permit is also requested.
 - 6.1 EQT012 & EQT013: A performance test is removed since it is required by 40 CFR 63.104(b).
 - 6.2 Amended the requirements to allow the performance test to be conducted using Method 18 with onsite Gas Chromatography/Mass Spectrometry.
 - 6.3 Amended the requirements to conduct ammonia performance tests using Method 206 to EPA's Conditional Test Method 027 (CTM-027).
 - 6.4 The requirements that reference 40 CFR 63.114(d)(1) and 40 CFR 63.114(d)(2). 40 CFR 63.114(d) requires compliance with either (d)(1) or (d)(2). The permit reflects the citation and requires compliance with either (d)(1) or (d)(2), but not both.

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- 6.5 The requirements that reference 40 CFR 63.127(d)(1) and 40 CFR 63.127(d)(2). 40 CFR 63.127(d) requires compliance with either (d)(1) or (d)(2). The permit reflects the citation and requires compliance with either (d)(1) or (d)(2), but not both.
- 6.6 The requirements that reference 40 CFR 63.148(f)(1) and 40 CFR 63.148(f)(2). 40 CFR 63.148(f) requires compliance with either (f)(1) or (f)(2). The permit reflects the citation and requires compliance with either (f)(1) or (f)(2), but not both.
- 6.7 The specific requirements for Wastewater Tanks EQT077 and EQT078 that reference process wastewater provisions; however, these tanks are not subject to process wastewater provisions. They are subject to process area storm water and maintenance wastewater provisions as listed in the original application dated February 9, 2005.
- 6.8 Revise the specific requirements to show the following wastewater streams as Group 2:
 - EQT064, MCL-631
 - EQT065, MCL-632
 - EQT079, MDCW-1
 - EQT080, MDCW-2
 - EQT081, MOHCW-1
 - EQT082, MOHCW-2
 - EQT083, MOHCW-3
 - EQT085, MEP-1
- 6.9 EQT101, Wastewater Tank, vents to the VCM Recovery Unit Nos. 1 and 2 (EQT096 and EQT097). 40 CFR 60.116(g) provides an exemption from 40 CFR 60.116b(c) and 40 CFR 60.116b(d) when a tank vent is routed to a closed vent system and control device. These requirements are removed in this permit modification.
- 6.10 FUG002, VCM Unit Fugitive Emissions, are incorrectly cited under 40 CFR 63.174(c)(2)(i) and (ii). These requirements are not applicable since the source was installed after 1992. These requirements are removed in this permit modification.
- 6.11 TRT001 and TRT002, Gas Thermal Oxidizers A and B, are incorrectly cited with several requirements. The following requirements are removed in this permit modification:

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- 40 CFR 63.113(c)(1)(ii) – This requirement is not applicable since this source was installed after 1992
- 40 CFR 63.126(d)(1)(ii) – This requirement is not applicable since this source was installed after 1992
- 40 CFR 63.143(b) and c(1) – These requirements are not applicable since the unit is not using a design steam stripper or biological treatment unit to treat a Group 1 Wastewater stream.
- Specific Requirements require the 0.025 lb/MM BTU NO_x emission limit to be determined on a 24-hour rolling average basis; however, continuous NO_x emission monitoring is not required by rule nor are there specific requirements in the permit for a NO_x continuous emission monitoring system (CEMS) to be installed at the thermal oxidizers. Since it is not required by rule or permit, Shintech requests correction of that the 24-hour rolling average statistical basis to an average of three 1-hour stack test runs.

7. Chapter 22 Applicability to the Cracking Furnaces

The VCM Unit Cracking Furnaces (EQT006, 009, 010, and 011) were identified in Section XI – Explanation for Exemption Status or Non-Applicability of a Source – as exempt from the requirements of LAC 33:III.2201 because the units were subject to a more stringent requirement – Lowest Achievable Emission Rate (LAER). The Cracking Furnaces are exempt from the emission limits of LAC 33:III.2201; however, according to LAC 33:III.2201.C.15, if more stringent requirement does not specify monitoring, reporting, and recordkeeping requirements, then the monitoring, reporting, and recordkeeping requirements of LAC 33:III.2201 apply.

Shintech requests incorporation of the monitoring, reporting and recordkeeping requirements of LAC 33:III.2201 into the air permit for the VCM Unit Cracking Furnaces as provided in Tables 1 and 2 of Section 3.0 of this application.

8. Remove requirements of the recently vacated 40 CFR 63 Subpart DDDDD.

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Estimated emissions in tons per year are as follows:

<u>Pollutant</u>	<u>Before</u>	<u>After</u>	<u>Change</u>
PM ₁₀	78.71	78.05	-0.66
SO ₂	2.80	3.46	+0.66
NO _X	92.85	95.34	+2.49
CO	211.03	212.52	+1.49
VOC *	62.36	66.14	+3.78

VOC LAC 33:III Chapter 51 Toxic Air Pollutants (TAPs):

<u>Pollutant</u>	<u>Before</u>	<u>After</u>	<u>Change</u>
1,1,2,2-Tetrachloroethane	0.004	0.005	+0.001
1,1,2-Trichloroethane	0.148	0.188	+0.040
1,1-Dichloroethane	0.069	0.076	+0.007
1,2-Dichloroethane	6.013	7.857	+1.844
Acetaldehyde	0.007	0.007	-
Benzene	0.009	0.009	-
Chloroethane	0.184	0.192	+0.008
Chloroprene	0.005	0.005	-
Formaldehyde	0.116	0.116	-
Methanol	6.879	6.879	-
Methyl Chloride	0.005	0.005	-
Toluene	0.004	0.004	-
Vinyl Chloride	28.823	30.105	+1.282
Vinyldene Chloride	0.015	0.015	-
Total	42.281	45.463	+3.182

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Non-VOC LAC 33:III Chapter 51 Toxic Air Pollutants (TAPs):

Pollutant	Before	After	Change
Ammonia	7.295	7.319	+0.024
Carbon Tetrachloride	0.302	0.332	+0.030
Chlorine	13.338	13.366	+0.028
Hydrochloric acid	10.536	10.478	-0.058
Total	31.471	31.495	+0.024

Other VOC (TPY): 20.68

IV. Type of Review

This permit was reviewed for compliance with 40 CFR 70, the Louisiana Air Quality Regulations, Prevention of Significant Deterioration (PSD), New Source Performance Standards (NSPS) and National Emission Standards for Hazardous Air Pollutants (NESHAP). This facility is a major source of toxic air pollutants (TAPs) pursuant to LAC 33:III, Chapter 51.

The Shintech Plaquemine Plant 1 (SPP-1) is located within a nonattainment area designated as moderate status for ozone with NO_x and VOC as precursors. NO_x and VOC emissions from the plant are below the Nonattainment New Source Review (NNSR) major source threshold of 100 tons/year but above the LAC 33:III.504.M threshold of 50 tons/year. The facility is classified as a minor source of NNSR, subject to LAC 33:III.504.M. CO emissions from the plant are above the PSD major source threshold of 100 tons/year. NO_x and PM/PM₁₀ emissions will be emitted at more than their PSD significance levels. Nitrogen dioxide (NO₂) is the compound regulated as a criteria pollutant. However, significant emissions are based on the sum of all oxides of nitrogen (NO_x). CO, NO₂, PM/PM₁₀, and VCM emissions have been reviewed under the PSD regulations.

A. Nonattainment New Source Review (NNSR)

VOC and NO_x emissions will be less than 100 TPY, the only provision of LAC 33:III.504 that applied when permit No. 1280-00118-V0 was issued on July 29, 2005 was the requirement to offset such emissions at a 1.2 to 1 ratio (LAC 33:III.504.M). However, Shintech elected to offset emissions at 1.3 to 1 ratio and install control technology equivalent to LAER.

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SPP-1 is located in Iberville parish, which is a part of a nonattainment area for ozone. Shintech voluntarily used a 1 to 1.3 offset ratio in the 2005 permit. In order to be consistent with the emission offset ratio of the project, Shintech will voluntarily offset the emissions associated with this reconciliation using the 1 to 1.3 offset ratio.

Shintech has used 120.71 tons/yr of NO_x credits transferred from Terra Mississippi Nitrogen Inc. and 81.07 tons/year of VOC credits transferred from BCP Liquidating LLC as offsets for NO_x and VOC emissions from the SPP-1 at a 1.3 to 1 ratio. The 50.30 tons/yr ozone season and 70.41 tons/year non-ozone season NO_x credits were generated by permanently shutting down the Ammonia No. 1 Reformer of the Terra Mississippi Nitrogen Inc. - Donaldsonville Facility (Permit No. 0180-00009-V0, dated January 11, 2001, Donaldsonville, Ascension Parish) in 2004. The 81.07 tons/year of VOC credits were generated by permanently shutting down the Acetylene Plant (Permit No. 2021(M-1), dated December 13, 2000, Geismar Facility, Ascension Parish) in April 2001.

For this modification Shintech will use 3.24 tons/yr of NO_x credits (1.35 tons/yr ozone season and 1.89 tons/year non-ozone season NO_x) transferred from Terra Mississippi Nitrogen Inc. and 4.91 tons/year of VOC credits total (2.81 tons/year transferred from BCP Liquidating LLC and 2.10 tons/year transferred from Terra Mississippi Nitrogen Inc.) as offsets for NO_x and VOC emissions from the SPP-1 are set at a 1.3 to 1 ratio.

B. Prevention of Significant Deterioration (PSD)

A PSD analysis was performed and documented in the Permit PSD-LA-709 which includes a Best Available Control Technology (BACT) analysis, an air quality analysis, and additional analyses.

1. BACT analysis: Because Shintech will control NO_x emissions from the plant to a degree equivalent to LAER, this control option will satisfy the BACT requirements for NO_x. The following techniques were determined as BACT:

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EIQ	Pollutants	Control Technologies	Permit Limits
ARE0001	PM/PM ₁₀	Paving plant road as much as practicable	0.22 lbs/hr
EQT0004	PM/PM ₁₀	Good design, maintenance and mist eliminators	0.08 lb/MM gal
EQT0006, EQT0009, EQT0010, & EQT0011	CO	Good combustion practices / natural gas fired	0.046 lb/MM BTU
	PM/PM ₁₀	Good combustion practices / natural gas fired	0.007 lb/MM BTU
	NO _x	LNB/SCR	0.009 lb/MM BTU
EQT0007	CO	No additional control	0.17 lb/hr
EQT0012	PM/PM ₁₀	Good design, maintenance and mist eliminators	0.06 lb/MM gal
EQT0015	PM/PM ₁₀	Cyclone / scrubber	0.0053 gr/dscf
EQT0021	PM/PM ₁₀	Good design, maintenance and mist eliminators	0.057 lb/MM gal
EQT0025	PM/PM ₁₀	Cyclone / scrubber	0.0053 gr/dscf
EQT0032	PM/PM ₁₀	Cyclone / baghouse	0.01 gr/dscf
EQT0033	PM/PM ₁₀	Cyclone / baghouse	0.01 gr/dscf
EQT0034	PM/PM ₁₀	Cyclone / baghouse	0.01 gr/dscf
EQT0035	PM/PM ₁₀	Cyclone / baghouse	0.01 gr/dscf
EQT0036	PM/PM ₁₀	Cyclone / baghouse	0.01 gr/dscf
EQT0037	PM/PM ₁₀	Cyclone / baghouse	0.01 gr/dscf
EQT0038	PM/PM ₁₀	Cyclone / baghouse	0.01 gr/dscf
EQT0039 & EQT0040	CO	Good combustion practices / gaseous fuel burning	0.036 lb/MM BTU
	PM/PM ₁₀	Good combustion practices / gaseous fuel burning	0.005 lb/MM BTU
	NO _x	LNB/FGR	0.040 lb/MM BTU
EQT0041 & EQT0042	CO	Good combustion practices / natural gas fired	0.036 lb/MM BTU
	PM/PM ₁₀	Good combustion practices / natural gas fired	0.005 lb/MM BTU
	NO _x	LNB/FGR	0.012 lb/MM BTU
EQT0175, EQT0174, & EQT0177	PM/PM ₁₀	Good design and maintenance	0.01 gr/scf
EQT170, EQT0171,	CO	Good combustion practices / gaseous fuel	0.85 lb/MM BTU

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EIQ	Pollutants	Control Technologies	Permit Limits
EQT0174; EQT0190, & EQT0197		burning	
	PM/PM ₁₀	Good combustion practices / gaseous fuel burning	0.1 lb/MM BTU
	NO _x	Good combustion practices / gaseous fuel burning	3.2 lb/MM BTU
EQT0167; EQT0168, EQT0169; EQT0178, EQT0186; EQT0187, EQT0188; EQT0189, EQT0191; EQT0192, EQT0193; EQT0194, EQT0195; & EQT0196	CO	Good combustion practices / gaseous fuel burning	0.95 lb/MM BTU
	PM/PM ₁₀	Good combustion practices / gaseous fuel burning	0.31 lb/MM BTU
	NO _x	Good combustion practices / gaseous fuel burning	4.41 lb/MM BTU
TRT0001 TRT0002	CO	Good combustion practices / gaseous fuel burning	0.11 lb/MM BTU
	PM/PM ₁₀	Good combustion practices / gaseous fuel burning / scrubber	0.0075 lb/MM BTU
	NO _x	Good combustion practices and SCR	0.025 lb/MM BTU

2. Air Quality Analysis: Screening dispersion modeling indicates that impacts of CO emissions from the proposed plant on air quality are below the preconstruction monitoring exemption levels and PSD significance levels. Refined modeling, increment consumption modeling, and preconstruction monitoring for CO are not required for this project.

Screening dispersion modeling indicates that impacts of PM₁₀ emissions from the SPP-1 on air quality are below the preconstruction monitoring exemption levels but above the PSD significance levels. Refined modeling and increment consumption modeling for PM₁₀ emissions are required for this project. Refined modeling showed that PM₁₀ emissions from the plant will not cause or contribute to any NAAQS exceedances. PSD increment allowances for PM₁₀ will be preserved.

3. Additional Impacts Analyses: There will be no impact on soils and vegetation in the area or on visibility of any Class I area. Growth impact will be minimal due to the small number of employee relocations and traffic increase.

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V. Credible Evidence

Notwithstanding any other provisions of any applicable rule or regulation or requirement of this permit that state specific methods that may be used to assess compliance with applicable requirements, pursuant to 40 CFR Part 70 and EPA's Credible Evidence Rule, 62 Fed. Reg. 8314 (Feb. 24, 1997), any credible evidence or information relevant to whether a source would have been in compliance with applicable requirements if the appropriate performance or compliance test or procedure had been performed shall be considered for purposes of Title V compliance certifications. Furthermore, for purposes of establishing whether or not a person has violated or is in violation of any emissions limitation or standard or permit condition, nothing in this permit shall preclude the use, including the exclusive use, by any person of any such credible evidence or information.

VI. Public Notice

A notice requesting public comment on the permit was published in *The Advocate*, Baton Rouge, on <date>, 200X; and in the <local paper>, <local town>, on <date>, 200X. A copy of the public notice was mailed to concerned citizens listed in the Office of Environmental Services Public Notice Mailing List on <date>. The draft permit was also submitted to US EPA Region VI on <date>. All comments will be considered prior to the final permit decision.

VII. Effects on Ambient Air

The PSD permit included an Air Quality Analysis. Emissions associated with the reconciliation were included to the emissions from the currently permitted emissions of SPP-1, as well as the proposed emissions from the SPP-2, HAPF-1, and HAPF-2, for an evaluation of the air quality impact from the SPP complex using an EPA approved model AERMOD.

Dispersion Model(s) Used: AERMOD (Criteria Pollutants) and ISC3 (TAPs)

Pollutant	Time Period	Calculated Maximum Ground Level Concentration	Louisiana Toxic Air Pollutant Ambient Air Standard or (National Ambient Air Quality Standard {NAAQS})
PM ₁₀	24-Hour	3.72	(150)
NO _x	Annual	0.78	(100)
CO	1-hour	226.95	(40,000)

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Pollutant	Time Period	Calculated Maximum Ground Level Concentration	Louisiana Toxic Air Pollutant Ambient Air Standard or (National Ambient Air Quality Standard {NAAQS})
CO	8-hour	105.01	(10,000)
Ethylene dichloride	Annual	1.31	3.85
Vinyl chloride	Annual	1.56	1.19
Chlorine	8-hour	19.05	35.7

The toxics air quality dispersion modeling analysis was conducted in accordance with the approved air quality dispersion modeling protocol. For all TAPs other than vinyl chloride, the modeling results show that there were no ambient air impacts greater than ambient air standard (AAS), demonstrating compliance with LAC 33:III.5109.B. Vinyl chloride modeling results show that there were nine receptors with ambient air impacts greater than the AAS. The receptors are located along Evergreen Road and at a restricted public access cemetery located off Evergreen Road entirely within the boundaries of the Georgia Gulf Facility.

The vinyl chloride AAS is based on an annual average. Since the receptor locations are in areas that are uninhabited and restricted access, long-term exposure to vinyl chloride is not expected. Additionally, modeling results show that the Shintech facility's contributions to the vinyl chloride impacts are relatively minor. A neighboring facility's vinyl chloride contributions to the nine receptors make up a significant portion of the predicted concentrations.

VIII. General Condition XVII Activities

Work Activity	Schedule	Emission Rates - tons					
		PM ₁₀	SO ₂	NO _x	CO	VOC	Other
Equipment Opening at Turnaround	1/yr	-	-	-	-	0.065	<0.001
Equipment Opening at Routine Operations	12/yr	0.066	-	-	-	-	0.006
Sampling	6710/yr	-	-	-	-	0.04	<0.001
Instrument Maintenance	580/yr	-	-	-	-	<0.01	0.02
Inert Gas Purging for Plant Startup	12/yr	-	-	-	-	0.10	-
Cracking Furnace Decoking	4/yr	0.22	-	0.05	0.83	-	-
Loading/Unloading Operations	5340/yr	-	-	-	-	0.02	-

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IX. Insignificant Activities

ID No.:	Description	Citation
T-1	Fuel Oil Tank	LAC 33:III.501.B.5.A.3
T-2	Sulfuric Acid Tank	LAC 33:III.501.B.5.D
L-1	Laboratory Vent	LAC 33:III.501.B.5.A.6
T-3	LB Make Up Tank	LAC 33:III.501.B.5.A.3
T-4	LH Make Up Tank	LAC 33:III.501.B.5.A.3
T-5	LD Make Up Tank	LAC 33:III.501.B.5.A.3
T-6	LJ Make Up Tank	LAC 33:III.501.B.5.A.3
L-2	Laboratory Equipment Vents	LAC 33:III.501.B.5.A.6
T-7	Fuel Oil Tank for Pump A	LAC 33:III.501.B.5.A.3
T-8	Fuel Oil Tank for Pump B	LAC 33:III.501.B.5.A.3
T-9	Fuel Oil Tank for Pump C	LAC 33:III.501.B.5.A.3
T-10	Fuel Oil Tank for EMG CW Pump	LAC 33:III.501.B.5.A.3
T-11	Fuel Oil Tank for EMG RW Pump	LAC 33:III.501.B.5.A.3
T-12	Sulfuric Acid Storage Pump	LAC 33:III.501.B.5.D
T-13	Fuel Oil Tank for EMG Neutralizer CW Pump A	LAC 33:III.501.B.5.A.3
T-14	Fuel Oil Tank for EMG Neutralizer CW Pump B	LAC 33:III.501.B.5.A.3
T-15	Fuel Oil Tank for EMG Neutralizer Circulation Pump A	LAC 33:III.501.B.5.A.3
T-16	Fuel Oil Tank for EMG Neutralizer Circulation Pump B	LAC 33:III.501.B.5.A.3
T-17	Fuel Oil Tank for EMG River Water Pump	LAC 33:III.501.B.5.A.3
T-18	Sulfuric Acid Tank	LAC 33:III.501.B.5.D
T-19	Sulfuric Acid Tank	LAC 33:III.501.B.5.D
MCL-621	Sulfuric Acid Tank	LAC 33:III.501.B.5.D
MCL-640	Hydrochloric Acid Tank	LAC 33:III.501.B.5.D
MTK-382	Ammonia Seal Tank	LAC 33:III.501.B.5.D

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

Shintech Louisiana LLC - Plaquemine PVC Plant
 Agency Interest No.: 126578
Shintech Louisiana LLC
Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33.III.Chapter																		
UNF0001	Shintech Plaquemine Plant 1	5	▲	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59
ARE0001	Road - Fugitive Dust (Paved Roads)		1	1	1	1											1	1	1	1
EQT0001	C-1 - No. 2 Chlorine Scrubber																1			
EQT0002	C-2 - HCl Scrubber																1			
EQT0003	C-3 - HCl Storage Tank Absorber																1			
EQT0004	C-4 - C/A Cooling Tower																1			
GRP0008	C-6 - C/A Unit Emergency Generator Engines																			
EQT0171	C-6A - C/A Unit Emergency Generator Engine																			
EQT0190	C-6B - C/A Unit Emergency Generator Engine																			
EQT0006	M-1 - Cracking Furnace A																	2		
EQT0009	M-2 - Cracking Furnace B																	2		
EQT0010	M-3 - Cracking Furnace C																	2		
EQT0011	M-4 - Cracking Furnace D																	2		
EQT0012	M-7 - VCM Cooling Tower 1																	1		
EQT0014	M-9 - Analyzer Vent 1																	1		
EQT0007	M-10 - Analyzer Vent 2																	1		
EQT0008	M-11 - Laboratory Hoods																	2		

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Shintech Louisiana LLC - Plaquemine PVC Plant
Agency Interest No.: 126578
Shintech Louisiana LLC
Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33:III Chapter																		
		5	4	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59
EQT0172	M-14 - VCM Equipment Opening for Turnaround																		1	
EQT0173	M-15 - VCM Equipment Opening for Maintenance																		1	
GRP0009	M-16 - VCM Unit Emergency Generator Engines																			
EQT0174	M-16A - VCM Unit Emergency Generator Engines																		2	
EQT0191	M-16B - VCM Unit Emergency Generator Engines																		2	
EQT0192	M-16C - VCM Unit Emergency Generator Engines																		2	
EQT0193	M-16D - VCM Unit Emergency Generator Engines																		2	
EQT0194	M-16E - VCM Unit Emergency Generator Engines																		2	
EQT0015	P-1 - Scrubber A																		1	
EQT0024	P-1a - Cushion Tank																		1	
EQT0025	P-2 - Scrubber B																		1	
EQT0031	P-2a - Cushion Tank																		1	
EQT0032	P-3 - Delivery Silo A																		1	
EQT0033	P-4 - Delivery Silo B																		1	

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Shintech Louisiana LLC - Plaquemine PVC Plant
Agency Interest No.: 126578
Shintech Louisiana LLC
Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

		LAC 33:III Chapter																	
ID No.:	Description	5▲	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59
EQT0034	P-5 - Delivery Silo C																		
EQT0035	P-6 - Delivery Silo D																		
EQT0036	P-7 - Delivery Silo E																		
EQT0037	P-8 - Delivery Silo F																		
EQT0038	P-9 - H/C Cleaning Silo																		
EQT0016	P-10 - CGF Storage Tank																		
EQT0017	P-11 - TB Storage Tank																		1
EQT0018	P-12 - TE Storage Tank																		3
EQT0019	P-13 - TN Storage Tank																		3
EQT0020	P-14 - BN Storage Tank																		3
EQT0021	P-15 - Cooling Tower																		1
EQT0022	P-18 - IF Make Up Tank																		1
EQT0023	P-19 - IF Measuring Tank																		1
EQT0026	P-20 - UH Make Up Tank																		3
EQT0027	P-21 - UH Measuring Tank																		3
EQT0028	P-22 - CG Make Up Tank																		3
EQT0029	P-23 - CG Measuring Tank																		3
EQT0030	P-24 - OZ Measuring Tank																		3
EQT0175	P-25 - IB Loading Hopper																		1

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Shintech Louisiana LLC - Plaquemine PVC Plant
 Agency Interest No.: 126578
 Shintech Louisiana LLC
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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.	Description	LAC 33:III.Chapter																			
		5	4	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59	
EQT0176	P-26 - IC Loading Hopper																				
EQT0177	P-27 - IFS Loading Hopper																				
GRP0010	P-28 - PVC Emergency Engines																				
EQT0178	P-28A - PVC Emergency Engine																				
EQT0195	P-28B - PVC Emergency Engine																				
EQT0196	P-28C - PVC Emergency Engine																				
EQT0197	P-28D - PVC Emergency Engine																				
EQT0039	U-1 - Boiler A																				
EQT0040	U-2 - Boiler B																				
EQT0041	U-3 - Boiler C																				
EQT0042	U-4 - Boiler D																				
EQT0043	U-5 - 35% HCl Tank Absorber																	1			
GRP0007	U-7 - South Tank Yard Firewater Pump Engine																				
EQT0167	U-7A - South Tank Yard Firewater Pump Engine																				
EQT0186	U-7B - South Tank Yard Firewater Pump Engine																				
EQT0187	U-7C - South Tank Yard Firewater Pump Engine																				

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Shintech Louisiana LLC - Plaquemine PVC Plant
Agency Interest No.: 126578
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Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33:III Chapter																	
		5▲	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59
GRP007	U-8 - North Tank Yard Firewater Pump Engine																		
EQT0168	U-8A - North Tank Yard Firewater Pump Engine	1	1	3															
EQT0188	U-8B - North Tank Yard Firewater Pump Engine	1	1	3															
EQT0189	U-8C - North Tank Yard Firewater Pump Engine	1	1	3															
EQT0169	U-9 - Ship Dock Emergency Pump	1	1	3															
EQT0170	U-10 - Utility Emergency Generator	1	1	3															
EQT0044	MCL-301 - Cracking Furnace A Initial Quench													3	3	3	3	3	3
EQT0045	MCL-302 - Cracking Furnace B Initial Quench													3	3	3	3	3	3
EQT0046	MCL-303 - Cracking Furnace C Initial Quench													3	3	3	3	3	3
EQT0047	MCL-304 - Cracking Furnace D Initial Quench													3	3	3	3	3	3
EQT0048	MRE-203 - OHC Reactor 1 Initial Quench													3	3	3	3	3	3
EQT0049	MRE-204 - OHC Reactor 2 Initial Quench													3	3	3	3	3	3
EQT0050	MRE-205 - OHC Reactor 3 Initial Quench													3	3	3	3	3	3

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33:III:Chapter																		
		6	▲	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59
EQT0051	MCL-204 - OHC Train - CO ₂ Stripper 1																			
EQT0052	MCL-205 - OHC Train - CO ₂ Stripper 2																			
EQT0053	MRE-101 - Direct Chlorination Reactor 1																			
EQT0054	MRE-102 - Direct Chlorination Reactor 2																			
EQT0055	MRE-103 - Direct Chlorination Reactor 3																			
EQT0056	MTK-105 - Direct Chlorination Reactor Product Separator																			
EQT0057	MCL-401 - EDC Purification Drying Column																			
EQT0058	MCL-402 - EDC Purification Lights Column																			
EQT0059	MCL-403 - EDC Purification Hiboil Column																			
EQT0060	MCL-404 - EDC Purification Vacuum Column																			
EQT0061	MCL-405 - EDC Purification Clean-up Column																			
EQT0062	MCL-231 - Process Wastewater Stripper 1																	2	1	
EQT0063	MCL-232 - Process Wastewater Stripper 2																	2	1	
EQT0064	MCL-631 - Process Area Stormwater Stripper 1																	2	-	

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33:III.Chapter																		
		5	4	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59
EQT0065	MCL-632 - Process Area Stormwater Stripper 2										1					2				
EQT0179	MCL-633 - Acid Recovery WW Stripper 1										1					2				
EQT0180	MCL-634 - Acid Recovery WW Stripper 2										1					2				
EQT0181	MTK-501 - Waste Feed Tank																			
EQT0066	VCLD-RC - VCM Railcar Loading Racks									1										
EQT0067	VCLD-SD - VCM Marine Loading Racks										1									
EQT0068	EDLD-SD - EDC Marine Loading Racks										1									
EQT0069	MTK491 - EDC Intermediate Storage No. 1											1								
EQT0070	MTK492 - EDC Intermediate Storage No. 2											1								
EQT0071	MTK493 - EDC Intermediate Storage No. 3											1								
EQT0072	MTK494 - EDC Intermediate Storage No. 4											1								
EQT0073	MTK495 - EDC Intermediate Storage No. 5											1								
EQT0074	MTK496 - By-Product Storage											1								
EQT0075	MTK499A - By-Product Tank No. 1											1								
EQT0076	MTK499B - By-Product Tank No. 2											1								
EQT0077	MTK719A - Wastewater Tank No. 1												3							
EQT0078	MTK719B - Wastewater Tank No. 2												3							

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33:III.Chapter																
		5▲	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56
EQT0079	MDCW-1 - Acidic Washing Water from Direct Chlorination															3	1	
EQT0080	MDCW-2 - Caustic Washing Water from Direct Chlorination															3	1	
EQT0081	MOHCW-1 - Byproduct Water from OHC Train 1															3	1	
EQT0082	MOHCW-2 - Byproduct Water from OHC Train 2															3	1	
EQT0083	MOHCW-3 - Byproduct Water from OHC Train 3															3	1	
EQT0085	MEP-1 - Water from Drying Column in EDC Purification Train															3	1	
EQT0086	MGTO-1 - Thermal Oxidizer A and Scrubber Bottoms Wastewater Stream															3	1	
EQT0087	MGTO-2 - Thermal Oxidizer B and Scrubber Bottoms Wastewater Stream															3	1	
EQT0088	MSW - Process Area Stormwater and Maintenance Wastewater																	
EQT0089	M-13 - Analyzer Vents - Unused samples															3	1	
EQT0090	P-ST - Slurry Tank															1	1	
EQT0091	P-SS - Slurry Stripper																1	

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	5	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59	LAC 33:III Chapter
EQT0092	P-RS - VCM Receiver System																			
EQT0093	P-GH1 - Gas Holder No. 1																			
EQT0094	P-GH2 - Gas Holder No. 2																			
EQT0095	P-KOT - Knock-Out Tank																			
EQT0096	P-RU1 - VCM Recovery Unit No. 1																			
EQT0097	P-RU2 - VCM Recovery Unit No. 2																			
EQT0098	P-C - Centrifuges																			
EQT0099	P-D - Dryers																			
EQT0100	P-S - Separators																			
EQT0101	P-WWT - Wastewater Tank																			
EQT0102	P-WWS - Wastewater Stripper																			
EQT0103	PVCWW-1 - Centrifuge Wastewater Discharge																			
EQT0104	PVCWW-2 - Wastewater Stripper Discharge																			
EQT0105	PVCWW-3 - Scrubber No. 1 Wastewater Discharge																			
EQT0106	PVCWW-4 - Scrubber No. 2 Wastewater Discharge																			
EQT0107	PVCWW-2a - Gas Holder No. 1 Wastewater Discharge																			

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

Shintech Louisiana LLC - Plaquemine PVC Plant
Agency Interest No.: 126578
Shintech Louisiana LLC
Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	LAC 33:III:Chapter																	
		5▲	9	11	13	15	2103	2107	2108	2111	2113	2115	2122	2147	2153	22	51	56	59
EQT0108	PVCWW-2b – Knock Out Tank Wastewater Discharge																		1
EQT0109	PVCWW-2c – VCM Recovery Wastewater Discharge																		1
EQT0110	PVCWW-2d – Gas Holder No. 2 Wastewater Discharge																		1
EQT0111	PVCWW-2e – Slurry Stripper Wastewater Discharge																		1
FUG0001	C-5 - C/A Unit Fugitive Emissions																		1
FUG0002	M-12 - VCM Unit Fugitive Emissions																		1
FUG0003	P-16 - Reactors																		1
FUG0004	P-17 - PVC Unit Fugitive Emissions																		1
FUG0005	U-6 - Fugitive Emission (Bio)																		3
TRT0001	M-5 - Gas Thermal Oxidizer A																		3
TRT0002	M-6 - Gas Thermal Oxidizer B																		3
GRP0002	U-CAP - Utility Boiler CAP																		3
GRP0003	P-CAP - Delivery Silo CAP																		1
GRP0004	M-CAP - Thermal Oxidizer CAP																		1

* The regulations indicated above are State Only regulations.

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

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▲ All LAC 33:III Chapter 5 citations are federally enforceable including LAC 33:III.501.C.6 citations, except when the requirement found in the "Specific Requirements" report specifically states that the regulation is State Only.

KEY TO MATRIX

- 1 -The regulations have applicable requirements that apply to this particular emission source.
-The emission source may have an exemption from control stated in the regulation. The emission source may not have to be controlled but may have monitoring, recordkeeping, or reporting requirements.
- 2 -The regulations have applicable requirements that apply to this particular emission source but the source is currently exempt from these requirements due to meeting a specific criterion, such as it has not been constructed, modified or reconstructed since the regulations have been in place. If the specific criteria changes the source will have to comply at a future date.
- 3 -The regulations apply to this general type of emission source (i.e. vents, furnaces, towers, and fugitives) but do not apply to this particular emission source.

Blank – The regulations clearly do not apply to this type of emission source.

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR			
		A	D _b	D _c	K _B	V _V	N _{NN}	R _{RR}	M _{III}	A	F	V	F _{FF}	A	B	F	G	H	J	Q	Y	U _U	Z _{ZZZ}	S ₅₂	S ₆₄	S ₆₈			
UNF0001	Shintech Plaquemine Plant 1													1	1	1										1	1	1	
ARE0001	Road - Fugitive Dust (Paved Roads)																										1		
EQT0001	C-1 - No. 2 Chlorine Scrubber																												
EQT0002	C-2 - HCl Scrubber																												
EQT0003	C-3 - HCl Storage Tank Absorber																												
EQT0004	C-4 - C/A Cooling Tower																										3	1	
GRP0008	C-6 - C/A Unit Emergency Generator Engines																												
EQT0171	C-6A - C/A Unit Emergency Generator Engine																											1	
EQT0190	C-6B - C/A Unit Emergency Generator Engine																											1	
EQT0006	M-1 - Cracking Furnace A																											1	
EQT0009	M-2 - Cracking Furnace B																											1	
EQT0010	M-3 - Cracking Furnace C																											1	
EQT0011	M-4 - Cracking Furnace D																											1	
EQT0012	M-7 - VCM Cooling Tower																										3	1	1

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Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR 63											
		A	Db	Dc	Kb	VV	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68											
1																																					
EQT0014	M-9 - Analyzer Vent 1																																				
EQT0007	M-10 - Analyzer Vent 2																																				
EQT0008	M-11 - Laboratory Hoods																																				
EQT0172	M-14 - VCM Equipment Opening for Turnaround																																				
EQT0173	M-15 - VCM Equipment Opening for Maintenance																																				
GRP0009	M-16 - VCM Unit Emergency Generator Engine																																				
EQT0174	M-16A - VCM Unit Emergency Generator Engine																																				
EQT0191	M-16B - VCM Unit Emergency Generator Engine																																				
EQT0192	M-16C - VCM Unit Emergency Generator Engine																																				
EQT0193	M-16D - VCM Unit Emergency Generator Engine																																				
EQT0194	M-16E - VCM Unit Emergency Generator Engine																																				

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Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR			
		A	D _b	D _c	K _b	V _V	N _{NN}	R _{RRR}	I _{III}	A	F	V	F _{FF}	A	B	F	G	H	J	Q	Y	U _U	2222	52	64	68			
EQT0015	P-1 - Scrubber A													1	1														
EQT0024	P-1a - Cushion Tank													1	1														
EQT0025	P-2 - Scrubber B													1	1														
EQT0031	P-2a - Cushion Tank													1	1														
EQT0032	P-3 - Delivery Silo A													1	1														
EQT0033	P-4 - Delivery Silo B													1	1														
EQT0034	P-5 - Delivery Silo C													1	1														
EQT0035	P-6 - Delivery Silo D													1	1														
EQT0036	P-7 - Delivery Silo E													1	1														
EQT0037	P-8 - Delivery Silo F													1	1														
EQT0038	P-9 - H/C Cleaning Silo													1	1														
EQT0016	P-10 - CGF Storage Tank													3															
EQT0017	P-11 - TB Storage Tank														3														
EQT0018	P-12 - TE Storage Tank														3														
EQT0019	P-13 - TN Storage Tank														3														
EQT0020	P-14 - BN Storage Tank														3														
EQT0021	P-15 - Cooling Tower															1	1												
EQT0022	P-18 - IF Make Up Tank																3												
EQT0023	P-19 - IF Measuring Tank																	3											

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.	Description	40 CFR 60												40 CFR 61												40 CFR 63																	
		A	D _b	D _c	K _b	V _V	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68	52	64	68	52	64	68	52	64	68								
EQT0026	P-20 - UH Make Up Tank																																										
EQT0027	P-21 - UH Measuring Tank																																										
EQT0028	P-22 - CG Make Up Tank																																										
EQT0029	P-23 - CG Measuring Tank																																										
EQT0030	P-24 - OZ Measuring Tank																																										
EQT0175	P-25 - IB Loading Hopper																																										
EQT0176	P-26 - IC Loading Hopper																																										
EQT0177	P-27 - IFS Loading Hopper																																										
GRP0010	P-28 - PVC Emergency Engines																																										
EQT0178	P-28A - PVC Emergency Engines																																										
EQT0195	P-28B - PVC Emergency Engines																																										
EQT0196	P-28C - PVC Emergency Engines																																										
EQT0197	P-28D - PVC Emergency Engines																																										
EQT039	U-1 - Boiler A	1	1																																								
EQT040	U-2 - Boiler B	1	1																																								
EQT041	U-3 - Boiler C	1	1																																								

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR 63											
		A	Db	Dc	Kb	VV	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68											
EQT0042	U-4 - Boiler D	1	1																																		
EQT0043	U-5 - 35% HCl Tank Absorber																																				
GRP0006	U-7 - South Tank Yard Firewater Pump Engine																																				
EQT0167	U-7A - South Tank Yard Firewater Pump Engine																																				
EQT0186	U-7B - South Tank Yard Firewater Pump Engine																																				
EQT0187	U-7C - South Tank Yard Firewater Pump Engine																																				
GRP0009	U-8 - North Tank Yard Firewater Pump Engine																																				
EQT0168	U-8A - North Tank Yard Firewater Pump Engine																																				
EQT0188	U-8B - North Tank Yard Firewater Pump Engine																																				
EQT0189	U-8C - North Tank Yard Firewater Pump Engine																																				
EQT0169	U-9 - Ship Dock Emergency Pump																																				

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

Shintech Louisiana LLC - Plaquemine PVC Plant
Agency Interest No.: 126578
Shintech Louisiana LLC
Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR		
		A	Db	Dc	Kb	VV	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68		
EQT0170	U-10 - Utility Emergency Generator																											
EQT0044	MCL-301 - Cracking Furnace A Initial Quench									3																		1
EQT0045	MCL-302 - Cracking Furnace B Initial Quench									3																		
EQT0046	MCL-303 - Cracking Furnace C Initial Quench									3																		
EQT0047	MCL-304 - Cracking Furnace D Initial Quench									3																		
EQT0048	MRE-203 - OHC Reactor 1 Initial Quench									3																		
EQT0049	MRE-204 - OHC Reactor 2 Initial Quench									3																		
EQT0050	MRE-205 - OHC Reactor 3 Initial Quench									3																		
EQT0051	MCL-204 - OHC Train - CO ₂ Stripper 1									3																		
EQT0052	MCL-205 - OHC Train - CO ₂ Stripper 2									3																		

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Plaquemine, Iberville Parish, Louisiana

X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR		
		A	D _b	D _c	K _b	W	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68		
EQT0053	MRE-101 - Direct Chlorination Reactor 1									3		3																
EQT0054	MRE-102 - Direct Chlorination Reactor 2									3		3																
EQT0055	MRE-103 - Direct Chlorination Reactor 3									3		3																
EQT0056	MTK-105 - Direct Chlorination Reactor Product Separator									3		3																
EQT0057	MCL-401 - EDC Purification Drying Column									3		3																
EQT0058	MCL-402 - EDC Purification Lights Column									3		3																
EQT0059	MCL-403 - EDC Purification Hiboil Column									3		3																
EQT0060	MCL-404 - EDC Purification Vacuum Column									3		3																
EQT0061	MCL-405 - EDC Purification Clean-up Column									3		3																

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR 63											
		A	Db	Dc	Kb	VV	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68											
EQT0062	MCL-231 - Process Wastewater Stripper 1																																				
EQT0063	MCL-232 - Process Wastewater Stripper 2																																				
EQT0064	MCL-631 - Process Area Stormwater Stripper 1																																				
EQT0065	MCL-632 - Process Area Stormwater Stripper 2																																				
EQT0179	MCL-633 - Acid Recovery WW Stripper 1																																				
EQT0180	MCL-634 - Acid Recovery WW Stripper 2																																				
EQT0181	MTK-501 - Waste Feed Tank																																				
EQT0066	VCLD-RC - VCM Railcar Loading Racks																																				
EQT0067	VCLD-SD - VCM Marine Loading Racks																																				
EQT0068	EDLD-SD - EDC Marine Loading Racks																																				

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR	
		A	D _b	D _c	K _b	W	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	2222	52	64	68	
EQT0069	MTK491 - EDC Intermediate Storage No. 1																										
EQT0070	MTK492 - EDC Intermediate Storage No. 2																										
EQT0071	MTK493 - EDC Intermediate Storage No. 3																										
EQT0072	MTK494 - EDC Intermediate Storage No. 4																										
EQT0073	MTK495 - EDC Intermediate Storage No. 5																										
EQT0074	MTK496 - By-Product Storage																										
EQT0075	MTK499A - By-Product Tank No. 1																										
EQT0076	MTK499B - By-Product Tank No. 2																										
EQT0077	MTK719A - Wastewater Tank No. 1																										
EQT0078	MTK719B - Wastewater Tank No. 2																										
EQT0079	MDCW-1 - Acidic Washing Water from Direct																										

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR 63																				
		A	Db	Dc	Kb	VW	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68																				
	Chlorination																																													
EQT0080	MDCW-2 - Caustic Washing Water from Direct Chlorination																																													
EQT0081	MOHCW-1 - Byproduct Water from OHC Train 1																																													
EQT0082	MOHCW-2 - Byproduct Water from OHC Train 2																																													
EQT0083	MOHCW-3 - Byproduct Water from OHC Train 3																																													
EQT0085	MEP-1 - Water from Drying Column in EDC Purification Train																																													
EQT0086	MGTO-1 - Thermal Oxidizer A and Scrubber Bottoms Wastewater Stream																																													
EQT0087	MGTO-2 - Thermal Oxidizer B and Scrubber Bottoms Wastewater Stream																																													

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR 63												40 CFR											
		A	Db	Dc	Kb	VV	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68																							
EQT0088	MSW - Process Area Stormwater and Maintenance Wastewater																																																
EQT0089	M-13 - Analyzer Vents – Unused samples																																																
EQT0090	P-ST - Slurry Tank																																																
EQT0091	P-SS - Slurry Stripper																																																
EQT0092	P-RS - VCM Receiver System																																																
EQT0093	P-GH1 - Gas Holder No. 1																																																
EQT0094	P-GH2 - Gas Holder No. 2																																																
EQT0095	P-KOT - Knock-Out Tank																																																
EQT0096	P-RU1 - VCM Recovery Unit No. 1																																																
EQT0097	P-RU2 - VCM Recovery Unit No. 2																																																
EQT0098	P-C - Centrifuges																																																
EQT0099	P-D - Dryers																																																
EQT0100	P-S - Separators																																																
EQT0101	P-WWT - Wastewater Tank	1																																															
EQT0102	P-WWS - Wastewater Stripper																																																

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 63												40 CFR		
		A	Db	Dc	Kb	Vb	NNN	RRR	III	A	F	V	FF	A	B	F	G	H	J	Q	Y	UU	ZZZZ	52	64	68		
EQT0103	PVCWW-1 - Centrifuge Wastewater Discharge																											
EQT0104	PVCWW-2 - Wastewater Stripper Discharge																											
EQT0105	PVCWW-3 - Scrubber No. 1 Wastewater Discharge																											
EQT0106	PVCWW-4 - Scrubber No. 2 Wastewater Discharge																											
EQT0107	PVCWW-2a - Gas Holder No. 1 Wastewater Discharge																											
EQT0108	PVCWW-2b - Knock Out Tank Wastewater Discharge																											
EQT0109	PVCWW-2c - VCM Recovery Wastewater Discharge																											
EQT0110	PVCWW-2d - Gas Holder No. 2 Wastewater Discharge																											
EQT0111	PVCWW-2e - Slurry Stripper Wastewater Discharge																											

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X. Applicable Louisiana and Federal Air Quality Requirements

ID No.:	Description	40 CFR 60												40 CFR 61												40 CFR					
		A	D _b	D _c	K _b	W _V	N _{NN}	R _{RRR}	I _{III}	A	F	V	F _F	A	B	F	G	H	J	Q	Y	U _U	2 ₂₂₂	S ₂	6 ₄	6 ₈					
FUG0001	C-5 - C/A Unit Fugitive Emissions																														
FUG0002	M-12 - VCM Unit Fugitive Emissions								3																						
FUG0003	P-16 - Reactors																														
FUG0004	P-17 - PVC Unit Fugitive Emissions																														
FUG0005	U-6 - Fugitive Emission (Bio)																														
TRT0001	M-5 - Gas Thermal Oxidizer A	1	1																												
TRT0002	M-6 - Gas Thermal Oxidizer B	1	1																												
GRP0002	U-CAP - Utility Boiler CAP																														
GRP0003	P-CAP - Delivery Silo CAP																														
GRP0004	M-CAP - Thermal Oxidizer CAP																														

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KEY TO MATRIX

- 1 -The regulations have applicable requirements that apply to this particular emission source.
-The emission source may have an exemption from control stated in the regulation. The emission source may not have to be controlled but may have monitoring, recordkeeping, or reporting requirements.
- 2 -The regulations have applicable requirements that apply to this particular emission source but the source is currently exempt from these requirements due to meeting a specific criterion, such as it has not been constructed, modified or reconstructed since the regulations have been in place. If the specific criteria changes the source will have to comply at a future date.
- 3 -The regulations apply to this general type of emission source (i.e. vents, furnaces, towers, and fugitives) but do not apply to this particular emission source.

Blank – The regulations clearly do not apply to this type of emission source.

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XI. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Status	Citation	Explanation
EQT001, EQT002, EQT003	LAC 33:III.5109 – MACT requirements	Does not apply	LAC 33:III.5109.B	MACT is not required for hydrochloric acid and chlorine (Class III TAP)
EQT004, EQT012, EQT013	LAC 33:III.5109 – MACT requirements	Does not apply	LAC 33:III.5109.B	MACT is not required for chlorine (Class III TAP)
EQT021	40 CFR 63.400 NESHAP Subpart Q for Cooling Towers	Does not apply	40 CFR 63.400	No chromium based water treatment chemicals will be used
EQT006, EQT009 EQT010, EQT011	LAC 33:III Chapter 15 Emission Standards for Sulfur Dioxide	Does not apply	LAC 33:III.1502.A.3	SO ₂ emissions < 5 tons/year
	LAC 33:III.2201 – Control of Emissions of NO _x	Exempt	LAC 33:III.2201.C.15	Subject to BACT which is more stringent than the standards of this Chapter
	40 CFR 60 Subpart Dc	Does not apply	40 CFR 60.40c	Units are Process Heaters as defined in Subpart Dc. Process Heaters are not subject to Subpart Dc.
EQT007, EQT014	LAC 33:III.2115 – Waste Gas Disposal	Exempt	LAC 33:III.2115.H.1.c	VOC emissions < 100 lbs/24 hr
	40 CFR 61.60 – NESHAP for vinyl chloride	Does not apply	40 CFR 61.65	These vents do not include the unused sample vents
	40 CFR 63 Subpart G	Does not apply	40 CFR 63.107(h)(9)	A gas stream exiting an analyzer is not classified as a process vent
EQT008	LAC 33:III.2115 – Waste Gas Disposal	Exempt	LAC 33:III.2115.H.1.c	VOC emissions < 100 lbs/24 hours
	40 CFR 63 Subpart F	Does not apply	40 CFR 63.100	Lab hood is not a process vent
EQT016, EQT018, EQT019	LAC 33:III.2103 – Storage of VOC	Does not apply	LAC 33:III.2103.A	Vapor Pressure < 1.5 psia
EQT026, EQT027	40 CFR 60.110b – NSPS for Storage Tanks	Does not apply	40 CFR 60.110b(a)	Tank volume < 19,813 gallons
EQT017, EQT022, EQT023	LAC 33:III.5109 – MACT requirements	Does not apply	LAC 33:III.5109.B	MACT is not required for methanol (Class III TAP)

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XI. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Status	Citation	Explanation
EQT017, EQT022, EQT023 (Continued)	40 CFR 60.110b – NSPS for Tanks	Does not apply	40 CFR 60.110b(a)	Tank volume < 19,813 gallons
EQT020	LAC 33:III.2103 – Storage of VOC 40 CFR 60.110b – NSPS for Tanks	Does not apply Does not apply	LAC 33:III.2103.A 40 CFR 60.110b(a)	The tank does not store VOL The tank does not store VOL
	LAC 33:III.5109 – MACT requirements	Does not apply	LAC 33:III.5109.B	MACT is not required for ammonia (Class II TAP)
EQT028, EQT029, EQT030	LAC 33:III.2103 – Storage of VOC LAC 33:III.5109 – MACT requirements 40 CFR 60.110b – NSPS for Storage Tanks	Does not apply Does not apply Does not apply	LAC 33:III.2103.A LAC 33:III.5109.B 40 CFR 60.110b(a)	Vapor Pressure < 1.5 psia MACT is not required for methanol (Class III TAP) Tank volume < 19,813 gallons
EQT039, EQT040 EQT041, EQT042	LAC 33:III Chapter 15. Emission Standards for Sulfur Dioxide LAC 33:III.2201 – Control of Emissions of NO _x	Does not apply Exempt	LAC 33:III.1502.A.3 LAC 33:III.2201.C.15	SO ₂ emissions < 5 tons/year Subject to BACT which is more stringent than the standards of this Chapter
EQT043	LAC 33:III.5109 – MACT requirements LAC 33:III.2115 – Waste Gas Disposal	Does not apply Does not apply	LAC 33:III.5109.B LAC 33:III.2115	MACT is not required for hydrochloric acid (Class III TAP) The streams subject to other more stringent regulations
EQT044, EQT045, EQT046 EQT047, EQT048, EQT049, EQT050, EQT051, EQT052 EQT053	LAC 33:III.2147 – for SOCM reactor and distillation operations 40 CFR 60.700 – NSPS Subpart RRR for reactors 40 CFR 61.60 – NESHAP Subpart F for vinyl chloride EQT053, EQT054, EQT055	Does not apply Does not apply Does not apply Does not apply	LAC 33:III.2147.A.2.g 40 CFR 63.110(d)(7) 40 CFR 63.110(1) LAC 33:III.2115	The equipment subjects to 40 CFR 63 Subpart G The equipment subjects to 40 CFR 63 Subpart G The equipment subjects to 40 CFR 63 Subpart G The streams subject to other more stringent regulations

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XI. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Status	Citation	Explanation
EQT053, EQT054, EQT055 (Continued)	LAC 33:III.2147 – for SOCMI reactors and distillation operations	Does not apply	LAC 33:2147.A.2.g	The equipment subjects to 40 CFR 63 Subpart G
	40 CFR 60.700 – NSPS Subpart RRR for reactors	Does not apply	40 CFR 63.110(d)(7)	The equipment subjects to 40 CFR 63 Subpart G
	40 CFR 61.60 – NESHAP Subpart F for vinyl chloride	Does not apply	40 CFR 61.60(a)(1)	Direct chlorination process
EQT056	LAC 33:III.2115 – Waste Gas Disposal	Does not apply	LAC 33:III.2115	The streams subject to other more stringent regulations
	LAC 33:III.2147 – for SOCMI reactors and distillation operations	Does not apply	LAC 33:2147.A.2.g	The equipment subjects to 40 CFR 63 Subpart G
	40 CFR 60.700 – NSPS Subpart NNN for reactors	Does not apply	40 CFR 63.110(d)(7)	The equipment subjects to 40 CFR 63 Subpart G
	40 CFR 61.60 – NESHAP Subpart F for vinyl chloride	Does not apply	40 CFR 61.60(a)(1)	Direct chlorination process
EQT057, EQT058, EQT059 EQT060, EQT061	LAC 33:III.2115 – Waste Gas Disposal	Does not apply	LAC 33:III.2115	The streams subject to other more stringent regulations
	LAC 33:2147 – for SOCMI reactors and distillation operations	Does not apply	LAC 33:2147.A.2.g	The equipment subjects to 40 CFR 63 Subpart G
	40 CFR 60.660(a) – NSPS Subpart NNN for distillation operations	Does not apply	40 CFR 63.110(d)(6)	The equipment subjects to 40 CFR 63 Subpart G
	40 CFR 61.60 – NESHAP Subpart F for vinyl chloride	Does not apply	40 CFR 63.110(f)(1)	The equipment subjects to 40 CFR 63 Subpart G
EQT062, EQT063	LAC 33:III.2115 – Waste Gas Disposal	Does not apply	LAC 33:III.2115	The streams subject to other more stringent regulations
	LAC 33:III.2153 – for industrial wastewater	Does not apply	LAC 33:2153.G.6	The equipment subjects to 40 CFR 63 Subpart G
EQT064, EQT065	LAC 33:III.2115 – Waste Gas Disposal	Does not apply	LAC 33:III.2115	The streams subject to other more stringent regulations

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XI. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Status	Citation	Explanation
EQT066	40 CFR 63.100 – NESHAP Subparts F and G for SOCMI	Does not apply	40 CFR 63.110(f)(10)	All loading activities will be vapor balanced
EQT067	40 CFR 63.100 – NESHAP Subparts F and G for SOCMI	Does not apply	40 CFR 63.100	The subparts do not apply to marine loading
	40 CFR 63.560 – NESHAP Subpart Y for marine loading	Does not apply	40 CFR 63.560(d)(2)	All loading activities will be vapor balanced
EQT068	40 CFR 61.60 – NESHAP Subpart F for vinyl chloride	Does not apply	40 CFR 61.65(b)(1)	The loading line will not be in vinyl chloride service
	40 CFR 63.100 – NESHAP Subparts F and G for SOCMI	Does not apply	40 CFR 61.65	The subparts do not apply to marine loading
	40 CFR 63.560 – NESHAP Subpart Y for marine loading	Does not apply	40 CFR 63.560(d)(2)	All loading activities will be vapor balanced
EQT069 thru EQT076	40 CFR 60.110b – NSPS Subpart Kb for tanks	Does not apply	40 CFR 63.110(b)(1)	The equipment subjects to 40 CFR 63 Subpart G
EQT077, EQT078	LAC 33:III:2103 – Storage of VOC	Does not apply	LAC 33:III:2103.A	Vapor pressure < 1.5 psia
	40 CFR 60.110b – NSPS Subpart Kb for tanks	Does not apply	40 CFR 60.110b	Vapor pressure < 0.5 psia
EQT079, EQT080	LAC 33:III:2153 for SOCMI wastewater	Does not apply	LAC 33:III:2153.G.6	The equipment subjects to 40 CFR 63.110 – Subpart G
	40 CFR 61.60 – NESHAP Subpart F for vinyl chloride	Does not apply	40 CFR 61.60(a)	This direct chlorination reactor process does not subject to the subpart
EQT081, EQT082, EQT083	LAC 33:III:2153 for SOCMI wastewater	Does not apply	LAC 33:III:2153.G.6	The equipment subjects to 40 CFR 63.110 – Subpart G
EQT085	LAC 33:III:2153 for SOCMI wastewater	Does not apply	LAC 33:III:2153.G.6	The equipment subjects to 40 CFR 63.110 – Subpart G
EQT086, EQT087	LAC 33:III:2153 for SOCMI wastewater	Does not apply	LAC 33:III:2153.A	By definition, VOHAP < 5 ppmw

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XI. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Status	Citation	Explanation
EQT086, EQT087 (Continued)	40 CFR 61.60 – NESHAP Subpart F for vinyl chloride	Does not apply	40 CFR 61.61	By definition, VOHAP < 5 ppmw
	40 CFR 63.100 – NESHAP Subparts F and G for SOCMF	Does not apply	40 CFR 63.101(b)	By definition, VOHAP < 5 ppmw
EQT089	LAC 33:III.2115 – Waste Gas Disposal	Does not apply	LAC 33:III.2115	Subject to 40 CFR 63 Subpart G
	40 CFR 61.60 – NESHAP for vinyl chloride	Does not apply	40 CFR 63.110(d)(1)	Subject to 40 CFR 63 Subpart G
EQT101	LAC 33:III.2103 – Storage of VOC	Does not apply	LAC 33:III.2103.A	Vapor Pressure < 1.5 psia
EQT0167, EQT0186, EQT0187, EQT0168, EQT0188, EQT0189, EQT0169, EQT0170, EQT0171, EQT0190, EQT0174, EQT0191, EQT0192, EQT0193, EQT0194, EQT0178, EQT0195, EQT0196, EQT0197	LAC 33:III.Chapter 15. Emission Standards for Sulfur Dioxide	Does not apply	LAC 33:III.1502.A.3	SO ₂ emissions < 5 tons/year
	LAC 33:III.Chapter 22	Exempt	LAC 33:III.2201.C.14	Diesel-fired Stationary internal combustion Engines are exempt.
EQT0167, EQT0186, EQT0187, EQT0168, EQT0188, EQT0189, EQT0169, EQT0174, EQT0191, EQT0192, EQT0193, EQT0194, EQT0178, EQT0195, EQT0196	40 CFR 63 Subpart ZZZZ	Does not apply	40 CFR 63.6645(d)	Emergency or limit use stationary RICE

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XI. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Status	Citation	Explanation
EQT0172, EQT0173	LAC 33:III.Chapter 21	Exempt	LAC 33:III.2122.D.5	Facility will comply with 40 CFR 63 Subpart H (HON) as part of its streamlined equipment leaks monitoring program.
	40 CFR 60 Subpart VV	Does not apply	40 CFR 60.480	Compliance with this Subpart is achieved by complying with 40 CFR 63, Subpart H per 40 CFR 63.160(b)(1).
	40 CFR 61 Subpart V	Does not apply	40 CFR 61.240	Compliance with this Subpart is achieved by complying with 40 CFR 63, Subpart H per 40 CFR 63.160(b)(1).
EQT0062, EQT0063, EQT0064, EQT0065, EQT0179, EQT0180	LAC 33:III.Chapter 21	Exempt	LAC 33:III.2153.G.6	Any component of a wastewater storage, handling, transfer, or treatment facility subject to the HON is exempt from the provisions of this section.
EQT0192, EQT0193, EQT0194, EQT0195, EQT0196	40 CFR 60 Subpart III	Does not apply	40 CFR 60.4200(a)(2) (i)	These emergency engines were manufactured prior to April 1, 2006.
FUG001	LAC 33:III.5109 – MACT requirements	Does not apply	LAC 33:III.5109.B	MACT is not required for hydrochloric acid and chlorine (Class III TAP)
FUG002	40 CFR 60.480 – NSPS Subpart VV for SOCM1 fugitives	Does not apply	40 CFR 63.160(b)(1)	Subject to 40 CFR 63 Subpart H
	40 CFR 61.60 – NESHAP Subpart F for vinyl chloride	Does not apply	40 CFR 63.160(b)(2)	Subject to 40 CFR 63 Subpart H
	40 CFR 61.240 – NESHAP Subpart V for equipment leaks	Does not apply	40 CFR 63.160(b)(2)	Subject to 40 CFR 63 Subpart H
FUG005	LAC 33:III.2153 – VOC emissions from Wastewater	Does not apply,	LAC 33:III.2153.A	VOC concentration < 10,000 ppmw

LOUISIANA DEPARTMENT OF ENVIRONMENTAL QUALITY

Shintech Louisiana LLC - Plaquemine PVC Plant
Agency Interest No.: 126578
Shintech Louisiana LLC
Plaquemine, Iberville Parish, Louisiana

XI. Explanation for Exemption Status or Non-Applicability of a Source

ID No:	Requirement	Status	Citation	Explanation
FUG005 (Continued)	40 CFR 61.65(b)(9) – Inprocess Wastewater	Does not apply	40 CFR 61.65(b)(9)	Does not receive any untreated inprocess wastewater
	40 CFR 61.340 - NESHAP Subpart FF – Benzene waste	Does not apply	40 CFR 63.110(e)(1)	Comply with 40 CFR 63 – NESHAP HON
	40 CFR 63 Subparts F and G	Does not apply	40 CFR 63.110	Received only wastewater streams that are treated to meet HON requirements
TRT001, TRT002	LAC 33:III.1503. Emission Standards for Sulfur Dioxide	Exempt	LAC 33:III.1503.C	SO ₂ emissions < 250 tons/year
	LAC 33:III.1511 CEM for SO ₂	Exempt	LAC 33:III.1511.A	SO ₂ emissions < 100 tons/year
	LAC 33:III.2201 – Control of Emissions of NO _x	Exempt	LAC 33:III.2201.C.7	Exempt by definition

The above table provides explanation for both the exemption status or non-applicability of a source cited by 2 or 3 in the matrix presented in Section X of this permit

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- A. The term of this permit shall be five (5) years from date of issuance. An application for a renewal of this 40 CFR Part 70 permit shall be submitted to the administrative authority no later than six months prior to the permit expiration date. Should a complete permit application not be submitted six months prior to the permit expiration date, a facility's right to operate is terminated pursuant to 40 CFR Section 70.7(c)(ii). Operation may continue under the conditions of this permit during the period of the review of the application for renewal. [LAC 33:III.507.E.1, E.3, E.4, reference 40 CFR 70.6(a)(2)]
- B. The conditions of this permit are severable; and if any provision of this permit or the application of any provision of this permit to any circumstance is held invalid, the application of such provision to other circumstances, and the remainder of this permit, shall not be affected thereby. [Reference 40 CFR 70.6(a)(5)]
- C. Permittee shall comply with all conditions of the 40 CFR Part 70 permit. Any permit noncompliance constitutes a violation of the Clean Air Act and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application. This permit may be modified, revoked, reopened and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any permit condition. [LAC 33:III.507.B.2, reference 40 CFR 70.6(a)(6)(i) & (iii)]
- D. It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. [Reference 40 CFR 70.6(a)(6)(ii)]
- E. This permit does not convey any property rights of any sort, or an exclusive privilege. [Reference 40 CFR 70.6(a)(6)(iv)]
- F. The permittee shall furnish to the permitting authority, within a reasonable time, any information that the permitting authority may request in writing to determine whether cause exists for modifying, revoking, and reissuing, or terminating the permit or to determine compliance with the permit. Upon request, the permittee shall also furnish to the permitting authority copies of records required to be kept by the permit or, for information claimed to be confidential, the permittee may furnish such records directly to the Administrator along with a claim of confidentiality. A claim of confidentiality does not relieve the permittee of the requirement to provide the information. [LAC 33:III.507.B.2, 517.F, reference 40 CFR 70.6(a)(6)(v)]
- G. Permittee shall pay fees in accordance with LAC 33:III.Chapter 2 and 40 CFR Section 70.6(a)(7). [LAC 33:III.501.C.2, reference 40 CFR 70.6(a)(7)]
- H. Upon presentation of credentials and other documents as may be required by law, the permittee shall allow the permitting authority or authorized representative to perform the following:
 - 1. enter upon the permittee's premises where a 40 CFR Part 70 source is located or emission-related activity is conducted, or where records must be kept under the conditions of the permit [LAC 33:III.507.H.2, reference 40 CFR 70.6(c)(2)(i)];

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2. have access to and copy, at reasonable times, any records that must be kept under the conditions of the permit [LAC 33:III.507.H.2, reference 40 CFR 70.6(c)(2)(ii)];
 3. inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under the permit [LAC 33:III.507.H.2, reference 40 CFR 70.6(c)(2)(iii)]; and
 4. as authorized by the Clean Air Act, sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with the permit or applicable requirements. [LAC 33:III.507.H.2, reference 40 CFR 70.6(c)(2)(iv)]
- I. All required monitoring data and supporting information shall be kept available for inspection at the facility or alternate location approved by the agency for a period of at least five (5) years from the date of the monitoring sample, measurement, report, or application. Supporting information includes calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation, and all reports required by the permit.
[Reference 40 CFR 70.6(a)(3)(ii)(B)]
- J. Records of required monitoring shall include the following:
1. the date, place as defined in the permit, and time of sampling or measurements;
 2. the date(s) analyses were performed;
 3. the company or entity that performed the analyses;
 4. the analytical techniques or methods used;
 5. the results of such analyses; and
 6. the operating conditions as existing at the time of sampling or measurement.
- [Reference 40 CFR 70.6(a)(3)(ii)(A)]
- K. Permittee shall submit at least semiannually, reports of any required monitoring, clearly identifying all instances of deviations from permitted monitoring requirements, certified by a responsible company official. For previously reported deviations, in lieu of attaching the individual deviation reports, the semiannual report may clearly reference the communication(s)/correspondence(s) constituting the prior report, including the date the prior report was submitted. The semiannual reports shall be submitted to the Office of Environmental Compliance, Enforcement Division by March 31 for the preceding period encompassing July through December and September 30 for the preceding period encompassing January through June. Any quarterly deviation report required to be submitted by March 31 or September 30 in accordance with Part 70 General Condition R may be consolidated with the semi-annual reports required by this general condition as long as the report clearly indicates this and all required information is included and clearly delineated in the consolidated report. [LAC 33:III.507.H, reference 40 CFR 70.6(a)(3)(iii)(A)]
- L. The permittee shall submit at least semiannual reports on the status of compliance pursuant to 40 CFR Section 70.5 (c) (8) and a progress report on any applicable schedule of compliance pursuant to 40 CFR Section 70.6 (c) (4). [LAC 33:III.507.H.1, reference 40 CFR 70.6(c)(4)]

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- M. Compliance certifications per LAC 33:III.507.H.5 shall be submitted to the Administrator as well as the permitting authority. For previously reported compliance deviations, in lieu of attaching the individual deviation reports, the annual report may clearly reference the communication(s)/correspondence(s) constituting the prior report; including the date the prior report was submitted. The compliance certifications shall be submitted to the Office of Environmental Compliance, Enforcement Division by March 31 for the preceding calendar year. [LAC 33:III.507.H.5, reference 40 CFR 70.6(c)(5)(iv)]
- N. If the permittee seeks to reserve a claim of an affirmative defense as provided in LAC 33:III.507.J.2, the permittee shall, in addition to any emergency or upset provisions in any applicable regulation, notify the permitting authority within 2 working days of the time when emission limitations were exceeded due to the occurrence of an upset. In the event of an upset, as defined under LAC 33:III.507.J, which results in excess emissions, the permittee shall demonstrate through properly signed, contemporaneous operating logs, or other relevant evidence that: 1) an emergency occurred and the cause was identified; 2) the permitted facility was being operated properly at the time; and 3) during the emergency the permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standard or requirement of the permit. [LAC 33:III.507.J.2, reference 40 CFR 70.6(g)(3)(iv) & (i-iii)]
- O. Permittee shall maintain emissions at a level less than or equal to that provided for under the allowances that the 40 CFR Part 70 source lawfully holds under Title IV of the Clean Air Act or the regulations promulgated thereunder. No permit revision shall be required for increases in emissions that are authorized by allowances acquired pursuant to the acid rain program, provided that such increases do not require a permit revision under any other applicable requirement. No limit shall be placed on the number of allowances held by the source. The source may not, however, use allowances as a defense to noncompliance with any other applicable requirement. Any such allowance shall be accounted for according to the procedures established in regulations promulgated under Title IV of the Clean Air Act. [Reference 40 CFR 70.6(a)(4)]
- P. Any permit issued pursuant to 40 CFR Part 70 may be subject to reopening prior to the expiration of the permit for any of the conditions specified in 40 CFR Section 70.7(f) or LAC 33:III.529. [LAC 33:III.529.A-B, reference 40 CFR 70.7(f)]
- Q. Permittee may request an administrative amendment to the permit to incorporate test results from compliance testing if the following criteria are met:
 - 1. the changes are a result of tests performed upon start-up of newly constructed, installed, or modified equipment or operations;
 - 2. increases in permitted emissions will not exceed five tons per year for any regulated pollutant;
 - 3. increases in permitted emissions of Louisiana toxic air pollutants or of federal hazardous air pollutants would not constitute a modification under LAC 33:III. Chapter 51 or under Section 112 (g) of the Clean Air Act;

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4. changes in emissions would not require new source review for prevention of significant deterioration or nonattainment and would not trigger the applicability of any federally applicable requirement;
 5. changes in emissions would not qualify as a significant modification; and
 6. the request is submitted no later than 12 months after commencing operation. [LAC 33:III.523.A, reference 40 CFR 70.7(d)]
- R. Permittee shall submit prompt reports of all permit deviations as specified below to the Office of Environmental Compliance, Enforcement Division. All such reports shall be certified by a responsible official in accordance with 40 CFR 70.5(d).
1. A written report shall be submitted within 7 days of any emission in excess of permit requirements by an amount greater than the Reportable Quantity established for that pollutant in LAC 33.I.Chapter 39.
 2. A written report shall be submitted within 7 days of the initial occurrence of any emission in excess of permit requirements, regardless of the amount, where such emission occurs over a period of seven days or longer.
 3. A written report shall be submitted quarterly to address all permit deviations not included in paragraphs 1 or 2 above. Unless required by an applicable reporting requirement, a written report is not required during periods in which there is no deviation. The quarterly deviation reports submitted on March 31 and September 30 may be consolidated with the semi-annual reports required by Part 70 General Condition K as long as the report clearly indicates this and all required information is included and clearly delineated in the consolidated report. For previously reported permit deviations, in lieu of attaching the individual deviation reports, the quarterly report may clearly reference the communication(s)/correspondence(s) constituting the prior report, including the date the prior report was submitted. The schedule for submittal of quarterly reports shall be no later than the dates specified below for any permit deviations occurring during the corresponding specified calendar quarter:
 - a. Report by June 30 to cover January through March
 - b. Report by September 30 to cover April through June
 - c. Report by December 31 to cover July through September
 - d. Report by March 31 to cover October through December
 4. Any written report submitted in advance of the timeframes specified above, in accordance with an applicable regulation, may serve to meet the reporting requirements of this condition provided such reports are certified in accordance with 40 CFR 70.5(d) and contain all information relevant to the permit deviation. Reporting under this condition does not relieve the permittee from the reporting requirements of any applicable regulation, including LAC 33.I.Chapter 39, LAC 33.III.Chapter 9, and LAC 33.III.5107. [Reference 40 CFR 70.6(a)(3)(iii)(B)]

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- S. Permittee shall continue to comply with applicable requirements on a timely basis, and will meet on a timely basis applicable requirements that become effective during the permit term. [Reference 40 CFR 70.5(c)(8)(iii)]
- T. The permittee shall comply with the standards for recycling and emissions reduction pursuant to 40 CFR Part 82, Subpart F, except as provided for Motor Vehicle Air Conditioners (MVACs) in Subpart B:
 1. Persons opening appliances for maintenance, service, repair, or disposal must comply with the required practices pursuant to 40 CFR 82.156;
 2. Equipment used during the maintenance, service, repair, or disposal of appliances must comply with the standards for recycling and recovery equipment pursuant to 40 CFR 82.158;
 3. Persons performing maintenance, service, repair, or disposal of appliances must be certified by an approved technician certification program pursuant to 40 CFR 82.161;
 4. Persons disposing of small appliances, MVACs, and MVAC-like appliances must comply with recordkeeping requirements pursuant to 40 CFR 82.166. ("MVAC-like appliance" as defined at 40 CFR 82.152);
 5. Persons owning commercial or industrial process refrigeration equipment must comply with the leak repair requirements pursuant to 40 CFR 82.156; and
 6. Owners/operators of appliances normally containing 50 or more pounds of refrigerant must keep records of refrigerant purchased and added to such appliances pursuant to 40 CFR 82.166. [Reference 40 CFR 82, Subpart F]
- U. If the permittee performs a service on motor (fleet) vehicles when this service involves ozone-depleting substance refrigerant (or regulated substitute substance) in the motor vehicle air conditioner (MVAC), the permittee is subject to all the applicable requirements as specified in 40 CFR Part 82, Subpart B, Servicing of Motor Vehicle Air Conditioners.

The term "motor vehicle" as used in Subpart B does not include a vehicle in which final assembly of the vehicle has not been completed. The term "MVAC" as used in Subpart B does not include the air-tight sealed refrigeration system used as refrigerated cargo, or system used on passenger buses using HCFC-22 refrigerant. [Reference 40 CFR 82, Subpart B]
- V. Data availability for continuous monitoring or monitoring to collect data at specific intervals: Except for monitoring malfunctions, associated repairs, and required quality assurance or control activities (including calibration checks and required zero and span adjustments), the permittee shall conduct all monitoring in continuous operation (or shall collect data at all required intervals) at all times that the emissions unit is operating. For purposes of reporting monitoring deviations under Part 70 General Conditions K and R, and unless otherwise provided for in the Specific Requirements (or Table 3) of this permit, the minimum degree of data availability shall be at least 90% (based on a monthly average) of the operating time of the emissions unit or activity being monitored. This condition does not apply to Leak Detection and Repair (LDAR) programs for fugitive emissions (e.g., 40 CFR 60 Subpart VV, 40 CFR 63 Subpart H).

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- I. This permit is issued on the basis of the emissions reported in the application for approval of emissions and in no way guarantees that the design scheme presented will be capable of controlling the emissions to the type and quantities stated. Failure to install, properly operate and/or maintain all proposed control measures and/or equipment as specified in the application and supplemental information shall be considered a violation of the permit and LAC 33:III.501. If the emissions are determined to be greater than those allowed by the permit (e.g. during the shakedown period for new or modified equipment) or if proposed control measures and/or equipment are not installed or do not perform according to design efficiency, an application to modify the permit must be submitted. All terms and conditions of this permit shall remain in effect unless and until revised by the permitting authority.
- II. The permittee is subject to all applicable provisions of the Louisiana Air Quality Regulations. Violation of the terms and conditions of the permit constitutes a violation of these regulations.
- III. The Emission Rates for Criteria Pollutants, Emission Rates for TAP/HAP & Other Pollutants, and Specific Requirements sections or, where included, Emission Inventory Questionnaire sheets establish the emission limitations and are a part of the permit. Any operating limitations are noted in the Specific Requirements or, where included, Tables 2 and 3 of the permit. The synopsis is based on the application and Emission Inventory Questionnaire dated February 29, 2008, along with supplemental information dated May 28, 2008.
- IV. This permit shall become invalid, for the sources not constructed, if:
 - A. Construction is not commenced, or binding agreements or contractual obligations to undertake a program of construction of the project are not entered into, within two (2) years (18 months for PSD permits) after issuance of this permit, or;
 - B. If construction is discontinued for a period of two (2) years (18 months for PSD permits) or more.The administrative authority may extend this time period upon a satisfactory showing that an extension is justified.

This provision does not apply to the time period between construction of the approved phases of a phased construction project. However, each phase must commence construction within two (2) years (18 months for PSD permits) of its projected and approved commencement date.
- V. The permittee shall submit semiannual reports of progress outlining the status of construction, noting any design changes, modifications or alterations in the construction schedule which have or may have an effect on the emission rates or ambient air quality levels. These reports shall continue to be submitted until such time as construction is certified as being complete. Furthermore, for any significant change in the design, prior approval shall be obtained from the Office of Environmental Services, Air Permits Division.

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GENERAL CONDITIONS**

- VI. The permittee shall notify the Department of Environmental Quality, Office of Environmental Services, Air Permits Division within ten (10) calendar days from the date that construction is certified as complete and the estimated date of start-up of operation. The appropriate Regional Office shall also be so notified within the same time frame.
- VII. Any emissions testing performed for purposes of demonstrating compliance with the limitations set forth in paragraph III shall be conducted in accordance with the methods described in the Specific Conditions and, where included, Tables 1, 2, 3, 4, and 5 of this permit. Any deviation from or modification of the methods used for testing shall have prior approval from the Office of Environmental Assessment, Air Quality Assessment Division.
- VIII. The emission testing described in paragraph VII above, or established in the specific conditions of this permit, shall be conducted within sixty (60) days after achieving normal production rate or after the end of the shakedown period, but in no event later than 180 days after initial start-up (or restart-up after modification). The Office of Environmental Assessment, Air Quality Assessment Division shall be notified at least (30) days prior to testing and shall be given the opportunity to conduct a pretest meeting and observe the emission testing. The test results shall be submitted to the Air Quality Assessment Division within sixty (60) days after the complete testing. As required by LAC 33:III.913, the permittee shall provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.
- IX. The permittee shall, within 180 days after start-up and shakedown of each project or unit, report to the Office of Environmental Compliance, Enforcement Division any significant difference in operating emission rates as compared to those limitations specified in paragraph III. This report shall also include, but not be limited to, malfunctions and upsets. A permit modification shall be submitted, if necessary, as required in Condition I.
- X. The permittee shall retain records of all information resulting from monitoring activities and information indicating operating parameters as specified in the specific conditions of this permit for a minimum of at least five (5) years.
- XI. If for any reason the permittee does not comply with, or will not be able to comply with, the emission limitations specified in this permit, the permittee shall provide the Office of Environmental Compliance, Enforcement Division with a written report as specified below.
 - A. A written report shall be submitted within 7 days of any emission in excess of permit requirements by an amount greater than the Reportable Quantity established for that pollutant in LAC 33.I Chapter 39.
 - B. A written report shall be submitted within 7 days of the initial occurrence of any emission in excess of permit requirements, regardless of the amount, where such emission occurs over a period of seven days or longer.

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- C. A written report shall be submitted quarterly to address all emission limitation exceedances not included in paragraphs A or B above. The schedule for submittal of quarterly reports shall be no later than the dates specified below for any emission limitation exceedances occurring during the corresponding specified calendar quarter:
 - 1. Report by June 30 to cover January through March
 - 2. Report by September 30 to cover April through June
 - 3. Report by December 31 to cover July through September
 - 4. Report by March 31 to cover October through December
- D. Each report submitted in accordance with this condition shall contain the following information:
 - 1. Description of noncomplying emission(s);
 - 2. Cause of noncompliance;
 - 3. Anticipated time the noncompliance is expected to continue, or if corrected, the duration of the period of noncompliance;
 - 4. Steps taken by the permittee to reduce and eliminate the noncomplying emissions; and
 - 5. Steps taken by the permittee to prevent recurrences of the noncomplying emissions.
- E. Any written report submitted in advance of the timeframes specified above, in accordance with an applicable regulation, may serve to meet the reporting requirements of this condition provided all information specified above is included. For Part 70 sources, reports submitted in accordance with Part 70 General Condition R shall serve to meet the requirements of this condition provided all specified information is included. Reporting under this condition does not relieve the permittee from the reporting requirements of any applicable regulation, including LAC 33.I.Chapter 39, LAC 33.III.Chapter 9, and LAC 33.III.5107.

XII. Permittee shall allow the authorized officers and employees of the Department of Environmental Quality, at all reasonable times and upon presentation of identification, to:

- A. Enter upon the permittee's premises where regulated facilities are located, regulated activities are conducted or where records required under this permit are kept;
- B. Have access to and copy any records that are required to be kept under the terms and conditions of this permit, the Louisiana Air Quality Regulations, or the Act;
- C. Inspect any facilities, equipment (including monitoring methods and an operation and maintenance inspection), or operations regulated under this permit; and
- D. Sample or monitor, for the purpose of assuring compliance with this permit or as otherwise authorized by the Act or regulations adopted thereunder, any substances or parameters at any location.

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- XIII. If samples are taken under Section XII.D. above, the officer or employee obtaining such samples shall give the owner, operator or agent in charge a receipt describing the sample obtained. If requested prior to leaving the premises, a portion of each sample equal in volume or weight to the portion retained shall be given to the owner, operator or agent in charge. If an analysis is made of such samples, a copy of the analysis shall be furnished promptly to the owner, operator or agency in charge.
- XIV. The permittee shall allow authorized officers and employees of the Department of Environmental Quality, upon presentation of identification, to enter upon the permittee's premises to investigate potential or alleged violations of the Act or the rules and regulations adopted thereunder. In such investigations, the permittee shall be notified at the time entrance is requested of the nature of the suspected violation. Inspections under this subsection shall be limited to the aspects of alleged violations. However, this shall not in any way preclude prosecution of all violations found.
- XV. The permittee shall comply with the reporting requirements specified under LAC 33:III.919 as well as notification requirements specified under LAC 33:III.927.
- XVI. In the event of any change in ownership of the source described in this permit, the permittee and the succeeding owner shall notify the Office of Environmental Services in accordance with LAC 33:I.Chapter 19.Facility Name and Ownership/Operator Changes Process.
- XVII. Very small emissions to the air resulting from routine operations, that are predictable, expected, periodic, and quantifiable and that are submitted by the permitted facility and approved by the Air Permits Division are considered authorized discharges. Approved activities are noted in the General Condition XVII Activities List of this permit. To be approved as an authorized discharge, these very small releases must:
1. Generally be less than 5 TPY
 2. Be less than the minimum emission rate (MER)
 3. Be scheduled daily, weekly, monthly, etc., or
 4. Be necessary prior to plant startup or after shutdown [line or compressor pressuring/depressuring for example]
- These releases are not included in the permit totals because they are small and will have an insignificant impact on air quality. This general condition does not authorize the maintenance of a nuisance, or a danger to public health and safety. The permitted facility must comply with all applicable requirements, including release reporting under LAC 33:I.3901.
- XVIII. Provisions of the permit may be appealed to the secretary in writing pursuant to La. R.S. 30:2024(A) within 30 days from notice of the permit action. A request may be made to the secretary to suspend those provisions of the permit specifically appealed. The permit remains in effect to the extent that the secretary or assistant secretary does not elect to suspend the appealed provisions as requested or, at his discretion, other permit provisions as well. Construction cannot proceed, except as specifically approved by the secretary or

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assistant secretary, until a final decision has been rendered on the appeal. A request for hearing must be sent to the Office of the Secretary. A request for hearing must be sent to the following:

Attention: Office of the Secretary, Legal Services Division
La. Dept. of Environmental Quality
Post Office Box 4302
Baton Rouge, Louisiana 70821-4302

- XIX. For Part 70 sources, certain Part 70 general conditions may duplicate or conflict with state general conditions. To the extent that any Part 70 conditions conflict with state general conditions, then the Part 70 general conditions control. To the extent that any Part 70 general conditions duplicate any state general conditions, then such state and Part 70 provisions will be enforced as if there is only one condition rather than two conditions.

EMISSION RATES FOR CRITERIA POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

Subject Item	CO			NOx			PM10			SO2			VOC		
	Avg lb/hr	Max lb/hr	Tons/Year												
Shintech Plaquemine Plant 1															
ARE 0001 Road							0.22	0.22	0.98						
EQT 0004 C-4							0.19	0.22	0.81						
EQT 0006 M-1	4.17	5	18.26	0.8	0.96	3.5	0.67	0.8	2.94	0.05	0.06	0.23	0.49	0.58	2.13
EQT 0007 M-10	0.14	0.17	0.63										0.05	0.06	0.21
EQT 0008 M-11													0.015	0.017	0.063
EQT 0009 M-2	4.17	5	18.26	0.8	0.96	3.5	0.67	0.8	2.94	0.05	0.06	0.23	0.49	0.58	2.13
EQT 0010 M-3	4.17	5	18.26	0.8	0.96	3.5	0.67	0.8	2.94	0.05	0.06	0.23	0.49	0.58	2.13
EQT 0011 M-4	4.17	5	18.26	0.8	0.96	3.5	0.67	0.8	2.94	0.05	0.06	0.23	0.49	0.58	2.13
EQT 0012 M-7							0.38	0.46	1.67						
EQT 0014 M-9													0.003	0.004	0.014
EQT 0015 P-1							4.76	4.76	20.87				2.82	16.21	12.35
EQT 0016 P-10													0.002	0.002	0.008
EQT 0017 P-11													0.026	0.026	0.112
EQT 0018 P-12													0.023	0.023	0.101
EQT 0019 P-13													0.002	0.002	0.007
EQT 0021 P-15							0.15	0.18	0.64						
EQT 0022 P-18													0.006	0.006	0.028
EQT 0023 P-19													0.006	0.006	0.028
EQT 0025 P-2							4.76	4.76	20.87				2.82	16.21	12.35
EQT 0026 P-20													0.006	0.006	0.019
EQT 0027 P-21													0.006	0.006	0.028
EQT 0028 P-22													<0.001	<0.001	0.001
EQT 0029 P-23													<0.001	<0.001	0.001

EMISSION RATES FOR CRITERIA POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

Subject Item	CO			NOx			PM10			SO2			VOC		
	Avg lb/hr	Max lb/hr	Tons/Year												
Shintech Plaquemine Plant 1															
EQT 0030 P-24													<0.001	<0.001	0.002
EQT 0032 P-3															
EQT 0033 P-4															
EQT 0034 P-5															
EQT 0035 P-6															
EQT 0036 P-7															
EQT 0037 P-8															
EQT 0038 P-9															
EQT 0039 U-1	9.05		10				1.25			0.16			0.65		
EQT 0040 U-2	9.05		10				1.25			0.16			0.65		
EQT 0041 U-3	9.05		3				1.25			0.16			0.65		
EQT 0042 U-4	9.05		3				1.25			0.16			0.65		
EQT 0167 U-TA	2.41		6.39				0.37			0.86			0.93		
EQT 0168 U-8A	2.53		6.72				0.39			0.91			0.97		
EQT 0169 U-9	1.53	2.58	0.05	4.06	6.85	0.13	0.24	0.40	0.01	0.55	0.92	0.02	0.59	0.99	0.02
EQT 0170 U-10	4.76	12.84	0.15	3.86	10.42	0.12	0.22	0.60	0.01	1.88	8.31	0.06	0.56	1.51	0.02
EQT 0171 M-14		32.03			26.00			1.51			20.74			3.77	
EQT 0172 M-15															
EQT 0173 M-16A		26.03			21.13			1.23			16.86			3.06	
EQT 0175 P-25										0.04	0.05	0.01			
EQT 0176 P-26										0.04	0.05	0.01			
EQT 0177 P-27										0.09	0.11	0.02			

EMISSION RATES FOR CRITERIA POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

Subject Item	CO			NOx			PM10			SO2			VOC		
	Avg lb/hr	Max lb/hr	Tons/Year												
Shintech Plaquemine Plant 1															
EQT 0178 P-28A	10.12			8.21			0.48			1.11			1.19		
EQT 0186 U-78	2.41			6.39			0.37			0.86			0.93		
EQT 0187 U-7C	2.41			6.39			0.37			0.86			0.93		
EQT 0188 U-68	2.53			6.72			0.39			0.91			0.97		
EQT 0189 U-6C	2.53			6.72			0.39			0.91			0.97		
EQT 0190 C-6B	4.63			7.90			0.27			9.77			0.57		
EQT 0191 M-16B	8.23			6.68			0.39			0.90			0.97		
EQT 0192 M-16C	1.20			5.58			0.40			0.37			0.45		
EQT 0193 M-16D	1.20			5.58			0.40			0.37			0.45		
EQT 0194 M-16E	1.20			5.58			0.40			0.37			0.45		
EQT 0195 P-28B	2.28			10.54			0.75			0.70			0.86		
EQT 0196 P-28C	1.20			5.58			0.40			0.37			0.45		
EQT 0197 P-28D	15.09			12.25			0.71			9.77			1.78		
FUG 0002 M-12													2.66	2.66	11.64
FUG 0003 P-18													0.82	4.94	0.25
FUG 0004 P-17													1.140	1.180	5.010
FUG 0005 U-6													0.26	0.31	1.13
GRP 0002 U-CAP	23.53		103.06	16.2		70.96	3.25		14.24	0.41		1.76	1.69	7.41	
GRP 0003 P-CAP							0.8		3.5						
GRP 0004 M-CAP	7.83		34.30	1.8		7.89	0.54		2.35	0.03		0.12	1.25		5.48
GRP 0006 U-7	1.50		0.13	6.97		0.60	0.49		0.04	0.46		0.04	0.56		0.05
GRP 0007 U-6	1.36		0.12	3.60		0.31	0.21		0.02	0.49		0.04	0.52		0.05
GRP 0008 C-6	5.59		0.34	5.17		0.32	0.27		0.02	2.45		0.15	0.66		0.04

EMISSION RATES FOR CRITERIA POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

Subject Item	CO			NOx			PM10			SO2			VOC		
	Avg lb/hr	Max lb/hr	Tons/Year	Avg lb/hr	Max lb/hr	Tons/Year	Avg lb/hr	Max lb/hr	Tons/Year	Avg lb/hr	Max lb/hr	Tons/Year	Avg lb/hr	Max lb/hr	Tons/Year
Shintech Plaquemine Plant 1															
GRP 0009 M-18 P-28	2.25		0.34	2.59		0.39	0.16		0.02	0.57		0.09	0.32		0.05
GRP 0010 M-5 M-6	4.14		0.59	4.23		0.60	0.26		0.04	1.87		0.27	0.55		0.08
TRT 0001		7.83		1.8		1.8			0.54			0.03			1.25
TRT 0002		7.83		1.8		1.8			0.54			0.03			1.25
Note: Emission rates in bold are from alternate scenarios and are not included in permitted totals unless otherwise noted in a footnote.															
Emission rates Notes:															
ARE 0001	PM10	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
ARE 0001	PM10	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0004	PM10	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0004	PM10	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0006	PM10	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0006	PM10	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0006	NOx	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0006	NOx	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0006	CO	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0006	CO	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0008	VOC	Avg lb/hr		- Determined as LAER	Which Months: All Year										
EQT 0009	PM10	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0009	PM10	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0009	NOx	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0009	NOx	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0009	CO	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0009	CO	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0010	PM10	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0010	PM10	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0010	NOx	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0010	NOx	Tons/Year		(PSD-LA-709)	Which Months: All Year										
EQT 0010	CO	Max lb/hr		(PSD-LA-709)	Which Months: All Year										
EQT 0010	CO	Tons/Year		(PSD-LA-709)	Which Months: All Year										

EMISSION RATES FOR CRITERIA POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT 0011	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0011	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year
NOx	NOx	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0011	NOx	Tons/Year	(PSD-LA-709)	Which Months: All Year
EQT 0011	CO	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0011	CO	Tons/Year	(PSD-LA-709)	Which Months: All Year
EQT 0012	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0012	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year
EQT 0015	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0015	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year
EQT 0016	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0017	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0018	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0019	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0021	PM10	Max lb/hr	- Using good design, maintenance, and mist eliminators . Determined as BACT. (PSD-LA-709)	Which Months: All Year
EQT 0021	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year
EQT 0022	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0023	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0025	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0025	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year
EQT 0026	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0027	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0028	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0029	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0030	VOC	Max lb/hr	- Using a fixed roof and a submerged fill pipe	Which Months: All Year
EQT 0032	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0033	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0034	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0035	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0036	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0037	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0038	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0038	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year

EMISSION RATES FOR CRITERIA POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT 0039	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0039	NOx	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0039	CO	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0040	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0040	NOx	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0040	CO	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0041	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0041	NOx	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0041	CO	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0042	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0042	NOx	Max lb/hr	(PSD-LA-709)	Which Months: All Year
EQT 0042	CO	Max lb/hr	(PSD-LA-709)	Which Months: All Year
GRP 0002	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year
GRP 0002	NOx	Tons/Year	(PSD-LA-709)	Which Months: All Year
GRP 0002	CO	Tons/Year	(PSD-LA-709)	Which Months: All Year
GRP 0003	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year
GRP 0004	PM10	Tons/Year	(PSD-LA-709)	Which Months: All Year
GRP 0004	NOx	Tons/Year	(PSD-LA-709)	Which Months: All Year
GRP 0004	CO	Tons/Year	(PSD-LA-709)	Which Months: All Year
TRT 0001	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
TRT 0001	NOx	Max lb/hr	(PSD-LA-709)	Which Months: All Year
TRT 0001	CO	Max lb/hr	(PSD-LA-709)	Which Months: All Year
TRT 0002	PM10	Max lb/hr	(PSD-LA-709)	Which Months: All Year
TRT 0002	NOx	Max lb/hr	(PSD-LA-709)	Which Months: All Year
TRT 0002	CO	Max lb/hr	(PSD-LA-709)	Which Months: All Year

EMISSION RATES FOR TAP/HAP & OTHER POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

Emission Pt.	Pollutant	Avg lb/hr	Max lb/hr	Tons/Year
EQT 0001 C-1	Chlorine	0.24	0.288	1.05
EQT 0002 C-2	Chlorine	0.002	0.002	0.008
	Hydrochloric acid	0.006	0.007	0.026
EQT 0003 C-3	Hydrochloric acid	< 0.001	< 0.001	< 0.001
EQT 0004 C-4	Chlorine	0.095	0.113	0.414
EQT 0006 M-1	Ammonia	0.22	0.264	0.964
	Benzene	< 0.001	< 0.001	0.001
	Formaldehyde	0.007	0.008	0.029
	Toluene	< 0.001	< 0.001	0.001
EQT 0007 M-10	1,2-Dichloroethane	0.023	0.028	0.102
	Carbon tetrachloride	< 0.001	< 0.001	< 0.001
	Chlorine	< 0.001	< 0.001	< 0.001
	Chloroethane	0.004	0.005	0.018
	Chloroform	0.001	0.001	0.003
	Hydrochloric acid	0.011	0.014	0.05
	Vinyl chloride	< 0.001	< 0.001	0.001
EQT 0008 M-11	Chloroethane	< 0.001	< 0.001	0.001
	Methanol	0.001	0.001	0.003
	Vinyl chloride	0.014	0.016	0.059
EQT 0009 M-2	Ammonia	0.22	0.264	0.964
	Benzene	< 0.001	< 0.001	0.001
	Formaldehyde	0.007	0.008	0.029
	Toluene	< 0.001	< 0.001	0.001
EQT 0010 M-3	Ammonia	0.22	0.264	0.964
	Benzene	< 0.001	< 0.001	0.001
	Formaldehyde	0.007	0.008	0.029
	Toluene	< 0.001	< 0.001	0.001
EQT 0011 M-4	Ammonia	0.22	0.264	0.964
	Benzene	< 0.001	< 0.001	0.001
	Formaldehyde	0.007	0.008	0.029
	Toluene	< 0.001	< 0.001	0.001
EQT 0012 M-7	Chlorine	0.330	0.396	1.445
EQT 0014 M-9	1,2-Dichloroethane	0.002	0.003	0.011
	Vinyl chloride	0.001	0.001	0.003

EMISSION RATES FOR TAP/HAP & OTHER POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

Emission Pt.	Pollutant	Avg lb/hr	Max lb/hr	Tons/Year
EQT 0015 P-1	Ammonia	0.107	0.128	0.468
	Methanol	0.735	5.1	3.218
	Vinyl chloride	2.003	9.275	8.775
EQT 0017 P-11	Methanol	0.026	0.026	0.112
EQT 0020 P-14	Ammonia	0.0066	0.0066	0.02891
EQT 0021 P-15	Chlorine	0.155	0.186	0.679
EQT 0022 P-18	Methanol	0.006	0.006	0.028
EQT 0023 P-19	Methanol	0.006	0.006	0.028
EQT 0025 P-2	Ammonia	0.107	0.128	0.468
	Methanol	0.735	5.1	3.218
	Vinyl chloride	2.003	9.275	8.775
EQT 0043 U-5	Hydrochloric acid	< 0.001	< 0.001	< 0.001
EQT 0172 M-14	1,2-Dichloroethane	2.295	2.754	0.289
	Vinyl chloride	0.517	0.620	0.065
EQT 0173 M-15	1,2-Dichloroethane	0.148	0.178	0.380
	Vinyl chloride	0.135	0.162	0.348
FUG 0001 C-5	Chlorine	0.207	0.207	0.909
	Hydrochloric acid	0.044	0.044	0.191
FUG 0002 M-12	1,1,2,2-Tetrachloroethane	0.001	0.001	0.005
	1,1,2-Trichloroethane	0.043	0.043	0.188
	1,1-Dichloroethane	0.008	0.008	0.034
	1,2-Dichloroethane	1.490	1.490	6.528
	Ammonia	0.067	0.067	0.293
	Carbon tetrachloride	0.033	0.033	0.146
	Chlorine	0.040	0.040	0.175
	Chloroethane	0.009	0.009	0.039
	Chloroform	0.022	0.022	0.097
	Hydrochloric acid	0.292	0.292	1.280
FUG 0003 P-18	Vinyl chloride	0.755	0.755	3.307
	Vinyl chloride	0.82	4.94	0.25
FUG 0004 P-17	Vinyl chloride	1.140	1.180	5.010
FUG 0005 U-6	Methanol	0.062	0.075	0.272
	Vinyl chloride	0.102	0.123	0.449
GRP 0004 M-CAP	1,1-Dichloroethane	0.009		0.042

EMISSION RATES FOR TAP/HAP & OTHER POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

Emission Pt.	Pollutant	Avg lb/hr	Max lb/hr	Tons/Year
GRP 0004 M-CAP	1,2-Dichloroethane	0.125		0.547
	Acetaldehyde	0.002		0.007
	Ammonia	0.503		2.205
	Benzene	0.001		0.005
	Carbon tetrachloride	0.042		0.186
	Chlorine	1.983		8.686
	Chloroethane	0.031		0.134
	Chloroform	0.027		0.118
	Chloroprene	0.001		0.005
	Hydrochloric acid	2.039		8.931
	Methyl chloride	0.001		0.005
	Vinyl chloride	0.699		3.063
TRT 0001 M-5	Vinyldene chloride	0.003		0.015
	1,1-Dichloroethane		0.009	
	1,2-Dichloroethane		0.125	
	Acetaldehyde		0.002	
	Ammonia		0.503	
	Benzene		0.001	
	Carbon tetrachloride		0.042	
	Chlorine		1.983	
	Chloroethane		0.031	
	Chloroform		0.027	
	Chloroprene		0.001	
	Hydrochloric acid		2.039	
TRT 0002 M-6	Methyl chloride		0.001	
	Vinyl chloride		0.699	
	Vinyldene chloride		0.003	
	1,1-Dichloroethane		0.009	
	1,2-Dichloroethane		0.125	
	Acetaldehyde		0.002	
	Ammonia		0.503	

EMISSION RATES FOR TAP/HAP & OTHER POLLUTANTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

Emission Pt.	Pollutant	Avg lb/hr	Max lb/hr	Tons/Year
TRT 0002 M-6	Chloroethane		0.031	
	Chloroform		0.027	
	Chloroprene		0.001	
	Hydrochloric acid		2.039	
	Methyl chloride		0.001	
	Vinyl chloride		0.699	
	Vinyldene chloride		0.003	
UNF 0003 SPY-1	1,1,2,2-Tetrachloroethane			0.005
	1,1,2-Trichloroethane			0.188
	1,1-Dichloroethane			0.076
	1,2-Dichloroethane			7.857
	Acetaldehyde			0.007
	Ammonia			7.319
	Benzene			0.009
	Carbon tetrachloride			0.332
	Chlorine			13.336
	Chloroethane			0.192
	Chloroform			0.218
	Chloroprene			0.005
	Formaldehyde			0.116
	Hydrochloric acid			10.478
	Methanol			6.879
	Methyl chloride			0.005
	Toluene			0.004
	Vinyl chloride			30.105
	Vinyldene chloride			0.015

Note: Emission rates in bold are from alternate scenarios and are not included in permitted totals unless otherwise noted in a footnote. Emission rates attributed to the UNF reflect the sum of the TAP/HAP limits of the individual emission points (or caps) under this permit, but do not constitute an emission cap.

Emission Rates Notes:

EQT 0017	Methanol	Max lb/hr	- Determined as MACT	Which Months: All Year
EQT 0022	Methanol	Max lb/hr	- Determined as MACT	Which Months: All Year
EQT 0023	Methanol	Max lb/hr	- Determined as MACT	Which Months: All Year

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

ARE0001 Road - Fugitive Dust (Paved Roads)

- 1 [LAC 33:III.509] Shall pave plant roads as much as possible - Determined as BACT - (PSD/LA-709). [LAC 33:III.509, 40 CFR 52]

EQT0001 C-1 • No.2 Chlorine Scrubber

- 2 [LAC 33:III.501.C.6] Scrubber Liquid Flow rate \geq 1200 gallons/min.
 Which Months: All Year Statistical Basis: Hourly average
 Scrubber effluent liquid pH \geq 9.0 (no units).
 Scrubber Liquid Flow rate monitored by flow rate monitoring device continuously.
 Which Months: All Year Statistical Basis: Hourly average
 Scrubber effluent liquid pH monitored by pH instrument continuously.
 Which Months: All Year Statistical Basis: Hourly average
- 3 [LAC 33:III.501.C.6]
 4 [LAC 33:III.507.H.1.a]
 5 [LAC 33:III.507.H.1.a]

EQT0002 C-2 • HCl Scrubber

- 6 [LAC 33:III.501.C.6] Scrubber Liquid Flow rate \geq 30 gallons/min.
 Which Months: All Year Statistical Basis: Hourly average
 Scrubber effluent liquid pH \geq 9.0 (no units).
 Scrubber Liquid Flow rate monitored by flow rate monitoring device continuously.
 Which Months: All Year Statistical Basis: Hourly average
 Scrubber effluent liquid pH monitored by pH instrument continuously.
 Which Months: All Year Statistical Basis: Hourly average
- 7 [LAC 33:III.501.C.6]
 8 [LAC 33:III.507.H.1.a]
 9 [LAC 33:III.507.H.1.a]

EQT0003 C-3 • HCL Storage Tank Absorber

- 10 [LAC 33:III.501.C.6] Absorber effluent liquid pH \geq 9.0 (no units).
 Liquid Flow rate \geq 1.50 gallons/min.
 Which Months: All Year Statistical Basis: Hourly average
 Absorber effluent liquid pH monitored by pH instrument daily.
 Which Months: All Year Statistical Basis: Hourly average
 Liquid Flow rate monitored by flow rate monitoring device continuously.
 Which Months: All Year Statistical Basis: Hourly average
- 11 [LAC 33:III.501.C.6]
 12 [LAC 33:III.507.H.1.a]
 13 [LAC 33:III.507.H.1.a]

EQT0004 C-4 • C/A Cooling Tower

- Particulate matter (10 microns or less) \leq 0.00008 lb/Mgal - Using good design, maintenance and mist eliminators - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
 Which Months: All Year Statistical Basis: Hourly average
- 14 [LAC 33:III.509]

EQT0006 M-1 - Cracking Furnace A

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0006 M-1 - Cracking Furnace A

- 15 [40 CFR 52] Particulate matter (10 microns or less) <= 0.007 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- 16 [LAC 33:III.1101.B] Which Months: All Year Statistical Basis: None specified
 Total suspended particulate <= 0.6 lb/MMBTU of heat input.
 Which Months: All Year Statistical Basis: None specified
 Fuel monitored by totalizer continuously. Monitor fuel input using a totalizing fuel meter.
 Which Months: May-Sep Statistical Basis: None specified
 Fuel recordkeeping by totalizing meter upon occurrence of event. Record the fuel input for each affected point source during each ozone season.
- 17 [LAC 33:III.1313.C] Submit notification: Due to DEQ within seven days if the BTU-per-ozone season limit is exceeded.
- 18 [LAC 33:III.2201.H.11] Submit permit modification: Due within 90 days after receipt of notification from DEQ of the loss of exemption due to exceedance of the BTU-per-ozone season limit. Submit a permit modification detailing how to meet the applicable emission factor as soon as possible; but no later than 24 months, after exceeding the limit. Include a schedule of increments of progress for the installation and operation of the required control equipment.
- 19 [LAC 33:III.2201.H.11] Conduct a performance/emissions test on any two of the cracking furnaces, EQT006, EQT009, EQT010, EQT011 (at least 50% population); Due within 180 days after initial startup or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of the PSD permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 10 - Determination of Carbon Monoxide Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits. [LAC 33:III.501.C.6, 40 CFR 63.750(a)]
- 20 [LAC 33:III.2201.H.11] Conduct a performance/emissions test on any two of the cracking furnaces, EQT006, EQT009, EQT010, EQT011 (at least 50% population); Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of the PSD permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources, Method 7E - Determination of Nitrogen Oxides Emissions from Stationary Sources, Method 25A - Determination of Total Gaseous Organic Concentration Using a Flame Ionization Analyzer, and Method 206 (Proposed in 40 CFR 51 Appendix M) to determined ammonia emissions. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.
- 21 [LAC 33:III.2201.H.11] VOC, Total <= 0.005 lb/MMBTU - using good combustion practices and natural gas fired.
 Which Months: All Year Statistical Basis: Three one-hour test average
- 22 [LAC 33:III.501.C.6]
- 23 [LAC 33:III.501.C.6]
- 24 [LAC 33:III.501.C.6]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0006 M-1 - Cracking Furnace A

- 25 [LAC 33:III.509] Carbon monoxide $\leq 0.046 \text{ lb/MMBTU}$ - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Nitrogen oxides $\leq 0.009 \text{ lb/MMBTU}$ - using good combustion practices, Selective Catalytic Reduction, and Low NOX Burners - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
 Which Months: All Year Statistical Basis: Three one-hour test average

EQT0007 M-10 - Analyzer Vent 2

- 27 [LAC 33:III.5109.A] VOC, Total $\geq 95\%$ control efficiency - Using carbon beds - Determined as MACT for TAP emissions.
 Which Months: All Year Statistical Basis: Hourly average

EQT0008 M-11 - Laboratory Hoods

- 28 [LAC 33:III.5109.A] VOC, Total $\geq 80\%$ control efficiency - Using carbon beds - Determined as MACT for TAP emissions.
 Which Months: All Year Statistical Basis: Hourly average

EQT0009 M-2 - Cracking Furnace B

- 29 [40 CFR 52] Particulate matter (10 microns or less) $\leq 0.007 \text{ lb/MMBTU}$ - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Opacity ≤ 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
 Which Months: All Year Statistical Basis: None specified
 Total suspended particulate $\leq 0.6 \text{ lb/MMBTU}$ of heat input.
 Which Months: All Year Statistical Basis: None specified
 Fuel monitored by totalizer continuously. Monitor-fuel input using a totalizing fuel meter.
 Which Months: May-Sep Statistical Basis: None specified
 Fuel recordkeeping by totalizing meter upon occurrence of event. Record the fuel input for each affected point source during each ozone season.
 Submit notification: Due to DEQ within seven days if the BTU-per-ozone season limit is exceeded.
 Submit permit modification: Due within 90 days after receipt of notification from DEQ of the loss of exemption due to exceedance of the BTU-per-ozone season limit. Submit a permit modification detailing how to meet the applicable emission factor as soon as possible, but no later than 24 months, after exceeding the limit. Include a schedule of increments of progress for the installation and operation of the required control equipment.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0009 M-2 - Cracking Furnace B

36 [LAC 33:III.501.C.6]

Conduct a performance/emissions test on any two of the cracking furnaces, EQT006, EQT009, EQT010, EQT011 (at least 50% population): Due within 180 days after initial startup or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of the PSD permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 10 - Determination of Carbon Monoxide Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits. [LAC 33:III.501.C.6, 40 CFR 63.750(a)]

37 [LAC 33:III.501.C.6]

Conduct a performance/emissions test on any two of the cracking furnaces, EQT006, EQT009, EQT010, EQT011 (at least 50% population): Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of the PSD permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources, Method 7E - Determination of Nitrogen Oxides Emissions from Stationary Sources, Method 25A - Determination of Total Gaseous Organic Concentration Using a Flame Ionization Analyzer, and Methods 206 (Proposed in 40 CFR 51 Appendix M) to determine ammonia emissions. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

38 [LAC 33:III.501.C.6]

VOC, Total <= 0.005 lb/MMBTU - using good combustion practices and natural gas fired.
 Which Months: All Year Statistical Basis: Three one-hour test average
 Carbon monoxide <= 0.046 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]

40 [LAC 33:III.509]

Nitrogen oxides <= 0.009 lb/MMBTU - using good combustion practices, Selective Catalytic Reduction, and Low NO_x Burners - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
 Which Months: All Year Statistical Basis: Three one-hour test average

EQT0010 M-3 - Cracking Furnace C

41 [40 CFR 52.]

Particulate matter (10 microns or less) <= 0.007 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

42 [LAC 33:III.1101.B]

Which Months: All Year Statistical Basis: None specified
 Total suspended particulate <= 0.6 lb/MMBTU of heat input.
 Which Months: All Year Statistical Basis: None specified
 Fuel monitored by totalizer continuously. Monitor fuel input using a totalizing fuel meter.
 Which Months: May-Sep Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0010 M-3 - Cracking Furnace C

- 45 [LAC 33:III.2201.H.11]
 46 [LAC 33:III.2201.H.11]
 47 [LAC 33:III.2201.H.11]

Fuel recordkeeping by totalizing meter upon occurrence of event. Record the fuel input for each affected point source during each ozone season.

Submit notification: Due to DEQ within seven days if the BTU-per-ozone season limit is exceeded.

Submit permit modification: Due within 90 days after receipt of notification from DEQ of the loss of exemption due to exceedance of the BTU-per-ozone season limit. Submit a permit modification detailing how to meet the applicable emission factor as soon as possible, but no later than 24 months, after exceeding the limit. Include a schedule of increments of progress for the installation and operation of the required control equipment.

Conduct a performance/emissions test on any two of the cracking furnaces, EQT006, EQT009, EQT010, EQT011 (at least 50% population);

Due within 180 days after initial startup or within 60 days after achieving normal production rate or end of the shakedown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of the PSD permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 10 - Determination of Carbon Monoxide Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits. [LAC 33:III.501.C.6, 40 CFR 63.7500(a)]

Conduct a performance/emissions test on any two of the cracking furnaces, EQT006, EQT009, EQT010, EQT011 (at least 50% population); Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shakedown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of the PSD permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources, Method 7E - Determination of Nitrogen Oxides Emissions from Stationary Sources, Method 25A - Determination of Total Gaseous Organic Concentration Using a Flame Ionization Analyzer, and Method 206 (Proposed in 40 CFR 51 Appendix M) to determine ammonia emissions. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

VOC, Total \leq 0.005 lb/MMBTU - using good combustion practices and natural gas fired.

Which Months: All Year Statistical Basis: Three one-hour test average

Carbon monoxide \leq 0.046 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]

Which Months: All Year Statistical Basis: Three one-hour test average

Nitrogen oxides \leq 0.009 lb/MMBTU - using good combustion practices, Selective Catalytic Reduction, and Low NOX Burners - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]

Which Months: All Year Statistical Basis: Three one-hour test average

EQT0011 M-4 - Cracking Furnace D

- 53 [40 CFR 52.]

Particulate matter (10 microns or less) \leq 0.007 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0011 M-4 - Cracking Furnace D

- 54 [LAC 33:III.1101.B] Opacity \leq 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
 Which Months: All Year Statistical Basis: None specified
 Total suspended particulate $<=$ 0.6 lb/MMBTU of heat input.
- 55 [LAC 33:III.1313.C] Which Months: All Year Statistical Basis: None specified
 Fuel monitored by totalizer continuously. Monitor fuel input using a totalizing fuel meter.
- 56 [LAC 33:III.2201.H.11] Which Months: May-Sep Statistical Basis: None specified
 Fuel recordkeeping by totalizing meter upon occurrence of event. Record the fuel input for each affected point source during each ozone season.
- 57 [LAC 33:III.2201.H.11] Submit notification: Due to DEQ within seven days if the BTU per-ozone season limit is exceeded.
- 58 [LAC 33:III.2201.H.11] Submit permit modification: Due within 90 days after receipt of notification from DEQ of the loss of exemption due to exceedance of the BTU per-ozone season limit. Submit a permit modification detailing how to meet the applicable emission factor as soon as possible, but no later than 24 months, after exceeding the limit. Include a schedule of increments of progress for the installation and operation of the required control equipment.
- 59 [LAC 33:III.2201.H.11] Conduct a performance/emissions test on any two of the cracking furnaces, EQT006, EQT009, EQT010, EQT011 (at least 50% population):
 Due within 180 days after initial startup or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of the PSD permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 10 - Determination of Carbon Monoxide Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits. [LAC 33:III.501.C.6, 40 CFR 63.750(a)]
- 60 [LAC 33:III.501.C.6] Conduct a performance/emissions test on any two of the cracking furnaces, EQT006, EQT009, EQT010, EQT011 (at least 50% population):
 Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of the PSD permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources, Method 7E - Determination of Nitrogen Oxides Emissions from Stationary Sources, Method 25A - Determination of Total Gaseous Organic Concentration Using a Flame Ionization Analyzer, and Methods 206 (Proposed in 40 CFR 51 Appendix M) to determined ammonia emissions. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.
 VOC, Total $<=$ 0.005 lb/MMBTU - using good combustion practices and natural gas fired.
- 61 [LAC 33:III.501.C.6] Which Months: All Year Statistical Basis: Three one-hour test average
 Carbon monoxide $<=$ 0.046 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
- 62 [LAC 33:III.501.C.6] Which Months: All Year Statistical Basis: Three one-hour test average
- 63 [LAC 33:III.509] Which Months: All Year Statistical Basis: Three one-hour test average

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER2008001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0011 M-4 - Cracking Furnace D

64 [LAC 33:III.509]

Nitrogen oxides ≤ 0.009 lb/MMBTU - using good combustion practices, Selective Catalytic Reduction, and Low NOX Burners - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
 Which Months: All Year Statistical Basis: Three one-hour test average

EQT0012 M-7 - VCM Cooling Tower 1

65 [40 CFR 63.104(b)]

Heat exchange systems (cooling water): HAP monitored by the regulation's specified method(s) monthly for the first 6 months and quarterly thereafter to detect leaks. Monitor for total hazardous air pollutants, total volatile organic compounds, total organic carbon, one or more speciated HAP compounds, or other representative substances that would indicate the presence of a leak in the heat exchange system. Subpart F. [40 CFR 63.104(b)]

66 [40 CFR 63.104(d)]

Which Months: All Year Statistical Basis: None specified
 Heat exchange systems: Repair leaks as soon as practicable but not later than 45 calendar days after receiving results of monitoring tests indicating a leak, if a leak is detected according to the criteria of 40 CFR 63.104(b) or (c). Once the leak has been repaired, confirm that the heat exchange system has been repaired within 7 calendar days of the repair or startup, whichever is later. Subpart F. [40 CFR 63.104(d)]

67 [40 CFR 63.104(f)]

Heat exchange systems: Equipment/operational data recordkeeping by electronic or hard copy continuously. Retain the records identified in 40 CFR 63.104(f)(1)(i) through (iv) as specified in 40 CFR 63.103(c)(1). Subpart F. [40 CFR 63.104(f)]

68 [LAC 33:III.509]

Particulate matter (10 microns or less) ≤ 0.00006 lb/Mgal - Using good design, maintenance and mist eliminators - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
 Which Months: All Year Statistical Basis: Hourly average

EQT0014 M-9 - Analyzer Vent 1

69 [LAC 33:III.5109.A]

VOC, Total $\geq 95\%$ control efficiency - Using carbon beds - Determined as MACT for TAP emissions.
 Which Months: All Year Statistical Basis: Hourly average

EQT0015 P-1 - Scrubber A

70 [40 CFR 61.64(e)(1)(ii)]

Weighted average residual concentration: Vinyl chloride ≤ 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]
 Which Months: All Year Statistical Basis: None specified

71 [40 CFR 61.65(b)(9)(i)]

Inprocess wastewater (vinyl chloride > 10 ppm): Vinyl chloride ≤ 10 ppm before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
 Which Months: All Year Statistical Basis: None specified

72 [40 CFR 61.65(b)(9)(ii)]

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
 Test emissions from the source within 90 days of startup using Test Method 18 with onsite Gas Chromatography/Mass Spectrometry. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

73 [40 CFR 61.67(a)(2)]

TPOR0147

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0015 P-1 - Scrubber A

- 74 [40 CFR 61.67(b)] Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- 75 [40 CFR 61.67(e)] Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- 76 [40 CFR 61.67(f)] Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- 77 [40 CFR 61.68(d)] Calculate the vinyl chloride content of emissions by best practical engineering judgement based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
- 78 [40 CFR 61.68(f)] Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
- 79 [40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]
- Methanol <= 10 ppmw (weight of methanol / weight of PVC) - Determined as MACT.
- Which Months: All Year Statistical Basis: Annual average
- Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- Which Months: All Year Statistical Basis: Six-minute average
- Conduct a performance/emissions test on either one of the dryers, EQT015 or EQT025: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shakedown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.
- Scrubber Liquid Flow rate monitored by flow rate monitoring device continuously.
- Which Months: All Year Statistical Basis: Hourly average
- Submit notification: Due at least 30 days prior to performance/emissions test to the Office of Environmental Assessment, Environmental Technology Division, Engineering Services, to provide the opportunity to conduct a pretest meeting and observe the emission testing.
- Submit report: Due within 60 days after performance/emissions test. Submit emissions test results to the Office of Environmental Assessment, Environmental Technology Division, Engineering Services.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0015 P-1 - Scrubber A

Particulate matter (10 microns or less) $\leq 0.0053 \text{ gr/dscf}$ - using cyclone followed by a wet scrubber - Determined as BACT (PSD-LA-709).

[LAC 33:III.509, 40 CFR 52]

Which Months: All Year Statistical Basis: Three one-hour test average

Scrubber Liquid Flow rate $\geq 50 \text{ gallons/min.}$ [LAC 33:III.509, 40 CFR 52, LAC 33:III.501.C.6]

Which Months: All Year Statistical Basis: Hourly average

Vinyl chloride $\leq 125 \text{ ppmw (weight of VCM / weight of PVC)}$ - Determined as MACT. [LAC 33:III.5109.A, 40 CFR 63.50]

Which Months: All Year Statistical Basis: Daily average

Vinyl chloride $\leq 27 \text{ ppmw (weight of VCM / weight of PVC)}$ - Determined as MACT. [40 CFR 63.50, LAC 33:III.5109.A]

Which Months: All Year Statistical Basis: Quarterly rolling average

EQT0017 P-11 - TB Storage Tank

Shall be equipped with a submerged fill pipe - Determined as MACT. [LAC 33:III.2103.A, 40 CFR 63.50]

VOL storage data recordkeeping by electronic or hard copy continuously. Keep records of the type(s) of VOC stored and the length of time stored.

Submit notification: Due to the Office of Environmental Compliance prior to tank filling, if possible, but no later than 24 hours after the tank starts filling. Notify in accordance with LAC 33:I.3923.A.

EQT0021 P-15 - Cooling Tower

Chlorine: Emissions $\leq 0.186 \text{ lbs/hr}$ - Determined as MACT.

EQT0022 P-18 - IF Make up Tank

Shall be equipped with a submerged fill pipe - Determined as MACT.

EQT0023 P-19 - IF Measuring Tank

Shall be equipped with a submerged fill pipe - Determined as MACT.

EQT0024 P-1a - Cushion Tank

Weighted average residual concentration: Vinyl chloride $\leq 2000 \text{ ppm}$ in PVC dispersion resins, excluding latex resins, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(i)]

Which Months: All Year Statistical Basis: None specified

Weighted average residual concentration: Vinyl chloride $\leq 400 \text{ ppm}$ in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]

Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0024 P-1a - Cushion Tank

- 98 [40 CFR 61.67(a)(2)] Test emissions from the source within 90 days of startup using Test Method 18 with onsite Gas Chromatograph/Mass Spectrometry. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)] Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- 100 [40 CFR 61.67(e)] Submit test results; Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- 101 [40 CFR 61.67(f)] Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- 102 [40 CFR 61.68(c)] Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
- 103 [40 CFR 61.68(d)] Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
- 104 [40 CFR 61.68(f)] Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
- 105 [40 CFR 61.68] Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.
- 106 [40 CFR 61.71(a)] Which Months: All Year Statistical Basis: None specified Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]

EQT0025 P-2 - Scrubber B

- 107 [40 CFR 61.64(e)(1)(ii)] Weighted average residual concentration: Vinyl chloride \leq 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]
- 108 [40 CFR 61.65(b)(9)(i)] Which Month: All Year Statistical Basis: None specified Inprocess wastewater (vinyl chloride $>$ 10 ppm); Vinyl chloride \leq 10 ppm before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride, before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

SPECIFIC REQUIREMENTS**All ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant****Activity Number: PER20080001****Permit Number: 1280-00118-V1****Air - Title V Regular Permit Minor Mod****EQT0025 P-2 - Scrubber B**

109 [40 CFR 61.65(b)(9)(ii)]

110 [40 CFR 61.67(a)(2)]

111 [40 CFR 61.67(e)]

112 [40 CFR 61.67(e)]

113 [40 CFR 61.67(f)]

114 [40 CFR 61.68(d)]

115 [40 CFR 61.68(f)]

116 [40 CFR 61.71(a)]

117 [40 CFR 63.50]

118 [LAC 33:III.1311.C]

119 [LAC 33:III.501.C.6]

120 [LAC 33:III.507.H.1.a]

121 [LAC 33:III.507.H.1.a]

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

Test emissions from the source within 90 days of startup using Test Method 18 with onsite Gas Chromatography/Mass Spectrometry. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]

Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]

Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F.

[40 CFR 61.67(f)] Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]

Methanol <= 10 ppmw (weight of methanol / weight of PVC) - Determined as MACT.

Which Months: All Year Statistical Basis: Annual average
Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average
Conduct a performance/emissions test on either one of the dryers, EQT015 or EQT025: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits. Scrubber Liquid Flow rate monitored by flow rate monitoring device continuously.

Which Months: All Year Statistical Basis: Hourly average
Submit notification: Due at least 30 days prior to performance/emissions test to the Office of Environmental Assessment, to provide the opportunity to conduct a pretest meeting and observe the emission testing.

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0025 P-2 - Scrubber B

- 122 [LAC 33:III.507.H.1.a] Submit report. Due within 60 days after performance/emissions test. Air Quality Assessment Division.
- 123 [LAC 33:III.509] Particulate matter (10 microns or less) $\leq 0.0053 \text{ gr/dscf}$ - using cyclone followed by a wet scrubber - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
- 124 [LAC 33:III.509] Which Months: All Year Statistical Basis: Three one-hour test average Scrubber Liquid Flow rate $\geq 50 \text{ gallons/min}$ (PSD-LA-709). [LAC 33:III.509, 40 CFR 52, LAC 33:III.501.C.6]
- 125 [LAC 33:III.5109.A] Which Months: All Year Statistical Basis: Hourly average Vinyl chloride $\leq 125 \text{ ppmw}$ (weight of VCM / weight of PVC) - Determined as MACT. [LAC 33:III.5109.A, 40 CFR 63.50]
- 126 [LAC 33:III.5109.A] Which Months: All Year Statistical Basis: Daily average Vinyl chloride $\leq 27 \text{ ppmw}$ (weight of VCM / weight of PVC) - Determined as MACT. [40 CFR 63.50, LAC 33:III.5109.A] Which Months: All Year Statistical Basis: Quarterly rolling average

EQT0031 P-2a - Cushion Tank

- 127 [40 CFR 61.64(e)(1)(i)] Weighted average residual concentration: Vinyl chloride $\leq 2000 \text{ ppm}$ in PVC dispersion resins, excluding latex resins, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(i)]
- 128 [40 CFR 61.64(e)(1)(ii)] Which Months: All Year Statistical Basis: None specified Weighted average residual concentration: Vinyl chloride $\leq 400 \text{ ppm}$ in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]
- 129 [40 CFR 61.67(a)(2)] Which Months: All Year Statistical Basis: None specified Test emissions from the source within 90 days of startup using Test Method 18 with onsite Gas Chromatography/Mass Spectrometry. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
- 130 [40 CFR 61.67(b)] Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- 131 [40 CFR 61.67(e)] Submit test results. Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- 132 [40 CFR 61.67(f)] Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- 133 [40 CFR 61.68(c)] Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
- 134 [40 CFR 61.68(d)] Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0031 P-2a - Cushion Tank

135 [40 CFR 61.68(f)]

Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]

Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.

136 [40 CFR 61.68]

Which Months: All Year Statistical Basis: None specified
 Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]

EQT0032 P-3 - Delivery Silo A

138 [40 CFR 52.]

Particulate matter (10 microns or less) <= 0.01 gr/dscf - Using a cyclone and a baghouse - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Weighted average residual concentration: Vinyl chloride <= 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]

139 [40 CFR 61.64(e)(1)(ii)]

Which Months: All Year Statistical Basis: None specified
 Opacity <= 20 percent, except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average
 Visible emissions monitored by visual inspection/determination daily on the operating silos.

141 [LAC 33:III.1311.C]

Which Months: All Year Statistical Basis: Instantaneous determination
 Conduct a performance/emissions test on any two of the silos, EQT032, EQT033, EQT034, EQT035, EQT036, EQT037: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

EQT0033 P-4 - Delivery Silo B

SPECIFIC REQUIREMENTS

AJ ID: 126578 . Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0033 P-4 - Delivery Silo B

- 143 [40 CFR 52.] Particulate matter (10 microns or less) <= 0.01 gr/dscf - Using a cyclone and a baghouse - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Weighted average residual concentration: Vinyl chloride <= 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]
- 144 [40 CFR 61.64(e)(1)(ii)] Which Months: All Year Statistical Basis: None specified
 Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- 145 [LAC 33:III.1311.C] Which Months: All Year Statistical Basis: Six-minute average
 Visible emissions monitored by visual inspection/determination daily on the operating silos.
- 146 [LAC 33:III.1311.C] Which Months: All Year Statistical Basis: Instantaneous determination
 Conduct a performance/emissions test on any two of the silos. EQT033, EQT034, EQT035, EQT036, EQT037: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

EQT0034 P-5 - Delivery Silo C

- 148 [40 CFR 52.] Particulate matter (10 microns or less) <= 0.01 gr/dscf - Using a cyclone and a baghouse - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Weighted average residual concentration: Vinyl chloride <= 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]
- 149 [40 CFR 61.64(e)(1)(ii)] Which Months: All Year Statistical Basis: None specified
 Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- 150 [LAC 33:III.1311.C] Which Months: All Year Statistical Basis: Six-minute average
 Visible emissions monitored by visual inspection/determination daily on the operating silos.
- 151 [LAC 33:III.1311.C] Which Months: All Year Statistical Basis: Instantaneous determination

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0034 P-5 - Delivery Silo C

152 [LAC 33:III.501.C.6]

Conduct a performance/emissions test on any two of the silos, EQT032, EQT033, EQT034, EQT035, EQT036, EQT037: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

EQT0035 P-6 - Delivery Silo D

153 [40 CFR 52.]

LAC 33:III.509]

Particulate matter (10 microns or less) <= 0.01 gr/dscf - Using a cyclone and a baghouse - Determined as BACT (PSD-LA-709). [40 CFR 52,

LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average Weighted average residual concentration: Vinyl chloride <= 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]

Which Months: All Year Statistical Basis: None specified
 Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average
 Visible emissions monitored by visual inspection/determination daily on the operating silos.

Which Months: All Year Statistical Basis: Instantaneous determination
 Conduct a performance/emissions test on any two of the silos, EQT032, EQT033, EQT034, EQT035, EQT036, EQT037: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

EQT0036 P-7 - Delivery Silo E

158 [40 CFR 52.]

LAC 33:III.509]

Particulate matter (10 microns or less) <= 0.01 gr/dscf - Using a cyclone and a baghouse - Determined as BACT (PSD-LA-709). [40 CFR 52,

LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average Weighted average residual concentration: Vinyl chloride <= 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]

Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
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EQT0036 P-7 - Delivery Silo E

160 [LAC 33:III.1311.C]

Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average

Visible emissions monitored by visual inspection/determination daily on the operating silos.

Which Months: All Year Statistical Basis: Instantaneous determination

Conduct a performance/emissions test on any two of the silos, EQT033, EQT034, EQT035, EQT036, EQT037: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

EQT0037 P-8 - Delivery Silo F

163 [40 CFR 52.]

Particulate matter (10 microns or less) <= 0.01 gr/dscf - Using a cyclone and a baghouse - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average Weighted average residual concentration: Vinyl chloride <= 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]

Which Months: All Year Statistical Basis: None specified

Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average

Visible emissions monitored by visual inspection/determination daily on the operating silos.

Which Months: All Year Statistical Basis: Instantaneous determination

Conduct a performance/emissions test on any two of the silos, EQT033, EQT034, EQT035, EQT036, EQT037: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack tests purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

EQT0038 P-9 - H/C Cleaning Silo

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SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
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EQT0038 P-9 - H/C Cleaning Silo

- 168 [40 CFR 52]
 Particulate matter (10 microns or less) $\leq 0.01 \text{ gr/dscf}$ - Using a cyclone and a baghouse - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Weighted average residual concentration: Vinyl chloride $\leq 400 \text{ ppm}$ in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]
- 169 [40 CFR 61.64(e)(1)(ii)]
 Which Months: All Year Statistical Basis: None specified
 Opacity ≤ 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- 170 [LAC 33:III.1311.C]
 Which Months: All Year Statistical Basis: Six-minute average
 Visible emissions monitored by visual inspection/determination daily on the operating silos.
- 171 [LAC 33:III.1311.C]
 Which Months: All Year Statistical Basis: Instantaneous determination
 Conduct a performance/emissions test: Due within 180 days after initial startup, or within 60 days after achieving normal production rate, or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources. Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

EQT0039 U-1 - Boiler A

- 173 [40 CFR 52].
 Particulate matter (10 microns or less) $\leq 0.005 \text{ lb/MMBTU}$ - using good combustion practices and gaseous fuel burning - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average
 Nitrogen oxides $\leq 0.20 \text{ lb/MMBTU}$ natural gas heat input (expressed as NO₂). The nitrogen oxide standards apply at all times, including periods of startup, shutdown, or malfunction. Subpart Db.
 Which Months: All Year Statistical Basis: Thirty-day rolling average based on a one-day average
 Conduct performance testing to demonstrate compliance with the nitrogen oxides emission standards in 40 CFR 60.44b by following 40 CFR 60.46b(e) or (f), or following 40 CFR 60.46b(g) and (h), as applicable. Subpart Db. [40 CFR 60.46b(c)]
 Nitrogen oxides monitored by CMS continuously. Calculate nitrogen oxides emission rates as specified in 40 CFR 60.48b(d). Subpart Db. [40 CFR 60.48b(b)(1)]
 Which Months: All Year Statistical Basis: One-hour average
 Nitrogen oxides recordkeeping by CMS continuously. Subpart Db. [40 CFR 60.48b(b)(1)]
 Operate NO_x continuous monitoring systems and record data during all periods of operation of the affected facility except for continuous monitoring system breakdowns and repairs. Record data during calibration checks, and zero and span adjustments. Subpart Db. [40 CFR 60.48b(c)]
 Follow the procedures under 40 CFR 60.13 and 40 CFR 60.48b(e)(1) through (e)(3) for installation, evaluation, and operation of the NO_x continuous monitoring systems. Subpart Db. [40 CFR 60.48b(e)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0039 U-1 - Boiler A

- 180 [40 CFR 60.49b(f)]
- 181 [40 CFR 60.49b(a)]
- 182 [40 CFR 60.49b(b)]
- 183 [40 CFR 60.49b(g)]
- 184 [40 CFR 60.49b(b)]
- 185 [40 CFR 60.49b(i)]
- 186 [40 CFR 60.49b(o)]
- 187 [LAC 33:III.1.101.B]
- 188 [LAC 33:III.1313.C]
- 189 [LAC 33:III.501.C.6]
- 190 [LAC 33:III.509]
- 191 [LAC 33:III.509]

When nitrogen oxides emission data are not obtained because of continuous monitoring system breakdowns, repairs, calibration checks and zero and span adjustments, obtain emission data by using standby monitoring systems, 40 CFR 60, Appendix A, Method 7, Method 7a, or other approved reference methods to provide emission data for a minimum of 75 percent of the operating hours in each steam generating unit operating day, in at least 22 out of 30 successive steam generating unit operating days. Subpart Db. [40 CFR 60.48b(f)]

Submit notification: Due as provided by 40 CFR 60.7. Submit a notification of the actual date of initial startup including design heat input capacity of the affected facility, identification of fuels to be combusted, copy of any federally enforceable requirement limiting annual capacity factor, and all other data as specified in 40 CFR 60.49b(a)(1) through (a)(4). Subpart Db. [40 CFR 60.49b(a)]

Submit the performance test data from the initial performance test and the performance evaluation of the CEMS using the applicable performance specifications in 40 CFR 60 Appendix B to DEQ. Subpart Db. [40 CFR 60.49b(b)]

Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records of the information listed in 40 CFR 60.49b(g)(1) through (g)(10) for each steam generating unit operating day, except as provided under 40 CFR 60.49b(p). Subpart Db. [40 CFR 60.49b(g)]

Submit excess emissions report: Due by the 30th day following the end of each six-month period. Report any excess emissions which occurred during the reporting period. Subpart Db. [40 CFR 60.49b(h)]

Submit reports containing the nitrogen dioxide emission rate information recorded under 40 CFR 60.49b(g). Subpart Db. [40 CFR 60.49b(i)]

Maintain all records required under 40 CFR 60.49b for a period of 2 years following the date of such record. Subpart Db. [40 CFR 60.49b(o)]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Total suspended particulate <= 0.6 lb/MMBTU of heat input.

Which Months: All Year Statistical Basis: None specified

VOC, Total <= 0.0026 lb/MMBTU - using good combustion practices and gaseous fuel burning.

Which Months: All Year Statistical Basis: Three one-hour test average

Carbon monoxide <= 0.036 lb/MMBTU - using good combustion practices and gaseous fuel burning - Determined as BACT (PSD-LA-709).

[LAC 33:III.509, 40 CFR 52]

Which Months: All Year Statistical Basis: Three one-hour test average

Nitrogen oxides <= 0.040 lb/MMBTU - using Low NOX Burners and Flue Gas Recirculation - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

Which Months: All Year Statistical Basis: 24-hour rolling average based on a one-hour average

EQT0040 U-2 - Boiler B

- 192 [40 CFR 52.]
- 193 [40 CFR 60.44b]

Particulate matter (10 microns or less) <= 0.005 lb/MMBTU - using good combustion practices and gaseous fuel burning - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average

Nitrogen oxides <= 0.20 lb/MMBTU natural gas heat input (expressed as NO₂). The nitrogen oxide standards apply at all times, including periods of startup, shutdown, or malfunction. Subpart Db.

Which Months: All Year Statistical Basis: Thirty-day rolling average based on a one-day average

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Piaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0040 U-2 - Boiler B

- 194 [40 CFR 60.48b(c)]
 195 [40 CFR 60.48b(b)(1)]
 196 [40 CFR 60.48b(b)(1)]
 197 [40 CFR 60.48b(c)]
 198 [40 CFR 60.48b(e)]
 199 [40 CFR 60.48b(f)]
 200 [40 CFR 60.49b(a)]
 201 [40 CFR 60.49b(b)]
 202 [40 CFR 60.49b(g)]
 203 [40 CFR 60.49b(h)]
 204 [40 CFR 60.49b(i)]
 205 [40 CFR 60.49b(o)]
 206 [LAC 33:III.1101.B]
 207 [LAC 33:III.1313.C]
 208 [LAC 33:III.501.C.6]
 209 [LAC 33:III.509]

Conduct performance testing to demonstrate compliance with the nitrogen oxides emission standards in 40 CFR 60.44b by following 40 CFR 60.46b(e) or (f), or following 40 CFR 60.46b(g) and (h), as applicable. Subpart Db. [40 CFR 60.46b(c)] Nitrogen oxides monitored by CMS continuously. Calculate nitrogen oxides emission rates as specified in 40 CFR 60.48b(d). Subpart Db. [40 CFR 60.48b(b)(1)]

Which Months: All Year Statistical Basis: One-hour average

Nitrogen oxides recordkeeping by CMS continuously. Subpart Db. [40 CFR 60.48b(b)(1)]

Operate NOx continuous monitoring systems and record data during all periods of operation of the affected facility except for continuous monitoring system breakdowns and repairs. Record data during calibration checks, and zero and span adjustments. Subpart Db. [40 CFR 60.48b(c)]

Follow the procedures under 40 CFR 60.13 and 40 CFR 60.48b(e)(1) through (e)(3) for installation, evaluation, and operation of the NOx continuous monitoring systems. Subpart Db. [40 CFR 60.48b(e)]

When nitrogen oxides emission data are not obtained because of continuous monitoring system breakdowns, repairs, calibration checks and zero and span adjustments, obtain emission data by using standby monitoring systems, 40 CFR 60, Appendix A, Method 7, Method 7a, or other approved reference methods to provide emission data for a minimum of 75 percent of the operating hours in each steam generating unit operating day, in at least 22 out of 30 successive steam generating unit operating days. Subpart Db. [40 CFR 60.48b(f)]

Submit notification: Due as provided by 40 CFR 60.7. Submit a notification of the actual date of initial startup including design heat input capacity of the affected facility, identification of fuels to be combusted, copy of any federally enforceable requirement limiting annual capacity factor, and all other data as specified in 40 CFR 60.49b(a)(1) through (a)(4). Subpart Db. [40 CFR 60.49b(a)]

Submit the performance test data from the initial performance test and the performance evaluation of the CEMS using the applicable performance specifications in 40 CFR 60 Appendix B to DEQ. Subpart Db. [40 CFR 60.49b(b)]

Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records of the information listed in 40 CFR 60.49b(g)(1) through (g)(10) for each steam generating unit operating day, except as provided under 40 CFR 60.49b(p). Subpart Db. [40 CFR 60.49b(g)]

Submit excess emissions report: Due by the 30th day following the end of each six-month period. Report any excess emissions which occurred during the reporting period. Subpart Db. [40 CFR 60.49b(h)]

Submit reports containing the nitrogen dioxide emission rate information recorded under 40 CFR 60.49b(g). Subpart Db. [40 CFR 60.49b(i)]

Maintain all records required under 40 CFR 60.49b for a period of 2 years following the date of such record. Subpart Db. [40 CFR 60.49b(o)]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Total suspended particulate <= 0.6 lb/MMBTU of heat input.

Which Months: All Year Statistical Basis: None specified

VOC, Total <= 0.0026 lb/MMBTU - using good combustion practices and gaseous fuel burning.

Which Months: All Year Statistical Basis: Three one-hour test average

Carbon monoxide <= 0.036 lb/MMBTU - using good combustion practices and gaseous fuel burning - Determined as BACT (PSD-LA-709).

Which Months: All Year Statistical Basis: Three one-hour test average

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0040 U-2 - Boiler B

210 [LAC 33:III.509]

Nitrogen oxides <= 0.040 lb/MMBTU - using Low NOX Burners and Flue Gas Recirculation - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]

Which Months: All Year Statistical Basis: 24-hour rolling average based on a one-hour average

EQT0041 U-3 - Boiler C

211 [40 CFR 52.]

Particulate matter (10 microns or less) <= 0.005 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average

212 [40 CFR 60.44b]

Nitrogen oxides <= 0.20 lb/MMBTU heat input (expressed as NO₂). The nitrogen oxide standards apply at all times, including periods of startup, shutdown, or malfunction. Subpart Db.

Which Months: All Year Statistical Basis: Thirty-day rolling average based on a one-day average.

213 [40 CFR 60.46b(c)]

Conduct performance testing to demonstrate compliance with the nitrogen oxides emission standards in 40 CFR 60.44b by following 40 CFR 60.46b(e) or (f), or following 40 CFR 60.46b(g) and (h), as applicable. Subpart Db. [40 CFR 60.46b(c)]

214 [40 CFR 60.48b(b)(1)]

Nitrogen oxides monitored by CMS continuously. Calculate nitrogen oxides emission rates as specified in 40 CFR 60.48b(d). Subpart Db. [40 CFR 60.48b(b)(1)]

Which Months: All Year Statistical Basis: One-hour average

Nitrogen oxides recordkeeping by CMS continuously. Subpart Db. [40 CFR 60.48b(b)(1)]

Operate NO_x continuous monitoring systems and record data during all periods of operation of the affected facility except for continuous monitoring system breakdowns and repairs. Record data during calibration checks, and zero and span adjustments. Subpart Db. [40 CFR 60.48b(c)]

Follow the procedures under 40 CFR 60.13 and 40 CFR 60.48b(e)(1) through (e)(3) for installation, evaluation, and operation of the NO_x continuous monitoring systems. Subpart Db. [40 CFR 60.48b(e)]

When nitrogen oxides emission data are not obtained because of continuous monitoring system breakdowns, repairs, calibration checks and zero and span adjustments, obtain emission data by using standby monitoring systems, 40 CFR 60, Appendix A, Method 7, Method 7a, or other approved reference methods to provide emission data for a minimum of 75 percent of the operating hours in each steam generating unit operating day, in at least 22 out of 30 successive steam generating unit operating days. Subpart Db. [40 CFR 60.48b(f)]

Submit notification: Due as provided by 40 CFR 60.7. Submit a notification of the actual date of initial startup including design heat input capacity of the affected facility, identification of fuels to be combusted, copy of any federally enforceable requirement limiting annual capacity factor, and all other data as specified in 40 CFR 60.49b(a)(1) through (a)(4). Subpart Db. [40 CFR 60.49b(a)]

Submit the performance test data from the initial performance test and the performance evaluation of the CEMS using the applicable performance specifications in 40 CFR 60 Appendix B to DEQ. Subpart Db. [40 CFR 60.49b(b)]

220 [40 CFR 60.49b(b)]

Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records of the information listed in 40 CFR 60.49b(g)(1) through (g)(10) for each steam generating unit operating day, except as provided under 40 CFR 60.49b(p). Subpart Db. [40 CFR 60.49b(g)]

221 [40 CFR 60.49b(h)]

Submit excess emissions report: Due by the 30th day following the end of each six-month period. Report any excess emissions which occurred during the reporting period. Subpart Db. [40 CFR 60.49b(h)]

222 [40 CFR 60.49b(i)]

Submit reports containing the nitrogen dioxide emission rate information recorded under 40 CFR 60.49b(g). Subpart Db. [40 CFR 60.49b(i)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0041 U-3 - Boiler C

- 224 [40 CFR 60.49b(o)]
 225 [LAC 33:III.1101.B]

Maintain all records required under 40 CFR 60.49b for a period of 2 years following the date of such record. Subpart Db. [40 CFR 60.49b(o)]
 Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

- 226 [LAC 33:III.1313.C]
 227 [LAC 33:III.501.C.6]

Which Months: All Year Statistical Basis: None specified
 Total suspended particulate <= 0.6 lb/MMBTU of heat input.
 Which Months: All Year Statistical Basis: None specified

- 228 [LAC 33:III.509]
 229 [LAC 33:III.509]

VOC, Total <= 0.0026 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT.
 Which Months: All Year Statistical Basis: Three one-hour test average
 Carbon monoxide <= 0.036 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

- 33:III.509, 40 CFR 52]

Which Months: All Year Statistical Basis: Three one-hour test average
 Nitrogen oxides <= 0.012 lb/MMBTU - using Low NOX Burners and Flue Gas Recirculation - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]

- 379 [LAC 33:III.509]
 Which Months: All Year Statistical Basis: 24-hour rolling average based on a one-hour average

EQT0042 U-4 - Boiler D

- 230 [40 CFR 52.]

Particulate matter (10 microns or less) <= 0.005 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

- 231 [40 CFR 60.44b]

Which Months: All Year Statistical Basis: Three one-hour test average
 Nitrogen oxides <= 0.20 lb/MMBTU heat input (expressed as NO₂). The nitrogen oxide standards apply at all times, including periods of startup, shutdown, or malfunction. Subpart Db.

- 232 [40 CFR 60.46b(c)]

Which Months: All Year Statistical Basis: Thirty-day rolling average based on a one-day average
 Conduct performance testing to demonstrate compliance with the nitrogen oxides emission standards in 40 CFR 60.44b by following 40 CFR 60.46b(e) or (f), or following 40 CFR 60.46b(g) and (h), as applicable. Subpart Db. [40 CFR 60.46b(c)]

- 233 [40 CFR 60.48b(b)(1)]

Nitrogen oxides monitored by CMS continuously. Calculate nitrogen oxides emission rates as specified in 40 CFR 60.48b(d). Subpart Db. [40 CFR 60.48b(b)(1)]

- 234 [40 CFR 60.48b(b)(1)]
 235 [40 CFR 60.48b(c)]

Which Months: All Year Statistical Basis: One-hour average
 Nitrogen oxides recordkeeping by CMS continuously. Subpart Db. [40 CFR 60.48b(b)(1)]
 Operate NOx continuous monitoring systems and record data during all periods of operation of the affected facility except for continuous monitoring system breakdowns and repairs. Record data during calibration checks, and zero and span adjustments. Subpart Db. [40 CFR 60.48b(c)]

- 236 [40 CFR 60.48b(e)]
 237 [40 CFR 60.48b(f)]

Follow the procedures under 40 CFR 60.13 and 40 CFR 60.48b(e)(1) through (e)(3) for installation, evaluation, and operation of the NO_x continuous monitoring systems. Subpart Db. [40 CFR 60.48b(e)]

When nitrogen oxides emission data are not obtained because of continuous monitoring system breakdowns, repairs, calibration checks and zero and span adjustments, obtain emission data by using standby monitoring systems, 40 CFR 60, Appendix A, Method 7, Method 7a, or other approved reference methods to provide emission data for a minimum of 75 percent of the operating hours in each steam generating unit operating day, in at least 22 out of 30 successive steam generating unit operating days. Subpart Db. [40 CFR 60.48b(f)]

SPECIFIC REQUIREMENTS**AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant**

Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0042 U-4 - Baller D

238 [40 CFR 60.49(b)(a)]

Submit notification: Due as provided by 40 CFR 60.7. Submit a notification of the actual date of initial startup including design heat input capacity of the affected facility, identification of fuels to be combusted, copy of any federally enforceable requirement limiting annual capacity factor, and all other data as specified in 40 CFR 60.49(b)(a)(1) through (a)(4). Subpart Db. [40 CFR 60.49b(a)]

239 [40 CFR 60.49b(b)]
Submit the performance test data from the initial performance test and the performance evaluation of the CEMIS using the applicable performance specifications in 40 CFR 60 Appendix B to DEQ. Subpart Db. [40 CFR 60.49b(b)]240 [40 CFR 60.49b(g)]
Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records of the information listed in 40 CFR 60.49b(g)(1) through (g)(10) for each steam generating unit operating day, except as provided under 40 CFR 60.49b(p). Subpart Db. [40 CFR 60.49b(g)]241 [40 CFR 60.49b(h)]
Submit excess emissions report: Due by the 30th day following the end of each six-month period. Report any excess emissions which occurred during the reporting period. Subpart Db. [40 CFR 60.49b(h)]242 [40 CFR 60.49b(i)]
Submit reports containing the nitrogen dioxide emission rate information recorded under 40 CFR 60.49b(g). Subpart Db. [40 CFR 60.49b(i)]243 [40 CFR 60.49b(o)]
Maintain all records required under 40 CFR 60.49b for a period of 2 years following the date of such record. Subpart Db. [40 CFR 60.49b(o)]244 [LAC 33:III.1|01.B]
Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.245 [LAC 33:III.1|13.C]
Which Months: All Year Statistical Basis: None specified
Total suspended particulate <= 0.6 lb/MMBTU of heat input.246 [LAC 33:III.501.C.6]
Which Months: All Year Statistical Basis: None specified
VOC, Total <= 0.026 lb/MMBTU - using good combustion practices and natural gas fired.247 [LAC 33:III.509]
Which Months: All Year Statistical Basis: Three one-hour test average
Carbon monoxide <= 0.036 lb/MMBTU - using good combustion practices and natural gas fired - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]248 [LAC 33:III.509]
Which Months: All Year Statistical Basis: Three one-hour test average
Nitrogen oxides <= 0.012 lb/MMBTU - using Low NOX Burners and Flue Gas Recirculation - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

Which Months: All Year Statistical Basis: 24-hour rolling average based on a one-hour average

EQT0043 U-5 - 35% HCL Tank Absorber249 [LAC 33:III.501.C.6]
Absorber effluent liquid pH >= 9.0 (no units).250 [LAC 33:III.501.C.6]
Liquid Flow rate >= 1.50 gallons/min.
Which Months: All Year Statistical Basis: Hourly average251 [LAC 33:III.507.H.1.a]
Absorber effluent liquid pH monitored by pH instrument daily.
Which Months: All Year Statistical Basis: Hourly average252 [LAC 33:III.507.H.1.a]
Liquid Flow rate monitored by flow rate monitoring device continuously.
Which Months: All Year Statistical Basis: Hourly average**EQT0044 MCL-301 - Cracking Furnace A Initial Quench**

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER2008001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0044 MCL-301 - Cracking Furnace A Initial Quench

- 253 [40 CFR 63.113(a)(2)] Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0045 MCL-302 - Cracking Furnace B Initial Quench

- Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0046 MCL-303 - Cracking Furnace C Initial Quench

- Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0046 MCL-303 - Cracking Furnace C Initial Quench

- Halogenated vent streams: Hydrogen halides and halogens $\geq 99\%$ reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
- Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
- Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0047 MCL-304 - Cracking Furnace D Initial Quench

- Organic HAP $\geq 98\%$ reduction by weight, or $\leq 20 \text{ ppmv}$, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Hydrogen halides and halogens $\geq 99\%$ reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
- Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a 'lock-and-key' type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
- Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0048 MRE-203 - OHC Reactor 1 Initial Quench

- Organic HAP $\geq 98\%$ reduction by weight, or $\leq 20 \text{ ppmv}$, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Hydrogen halides and halogens $\geq 99\%$ reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
- Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0048 MRE-203 - OHC Reactor 1 Initial Quench

- 275 [40 CFR 63.113(c)(1)] Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 276 [40 CFR 63.114(d)(1)] Bypass lines: Flow monitored by flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0049 MRE-204 - OHC Reactor 2 Initial Quench

- 278 [40 CFR 63.113(a)(2)] Organic HAP $\geq 98\%$ reduction by weight, or ≤ 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c). Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens $\geq 99\%$ reduction, or reduce the outlet mass of total hydrogen halides and halogens < 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 280 [40 CFR 63.113(c)(1)] Bypass lines: Flow monitored by flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0050 MRE-205 - OHC Reactor 3 Initial Quench

- 283 [40 CFR 63.113(a)(2)] Organic HAP $\geq 98\%$ reduction by weight, or ≤ 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c). Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens $\geq 99\%$ reduction, or reduce the outlet mass of total hydrogen halides and halogens < 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0050 MRE-205 - OHC Reactor 3 Initial Quench

286 [40 CFR 63.114(d)(1)] Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0051 MCL-204 - OHC Train - CO2 Stripper 1

288 [40 CFR 63.113(a)(2)] Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $<$ 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0052 MCL-205 - OHC Train - CO2 Stripper 2

293 [40 CFR 63.113(a)(2)] Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $<$ 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]

SPECIFIC REQUIREMENTS**AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant****Activity Number: PER2008001****Permit Number: 1280-00118-V1****Air - Title V Regular Permit Minor Mod****EQT0052 MCL-205 - OHC Train - CO₂ Stripper 2**

- Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
- Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0053 MRE-101 - Direct Chlorination Reactor 1

- Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
- Subpart G. [40 CFR 63.113(a)(2)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
- Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
- Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0054 MRE-102 - Direct Chlorination Reactor 2

- Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
- Subpart G. [40 CFR 63.113(a)(2)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]

SPECIFIC REQUIREMENTS**AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant****Activity Number: PER20080001****Permit Number: 1280-00118-V1****Air - Title V Regular Permit Minor Mod****EQT0054 MRE-102 - Direct Chlorination Reactor 2**

306 [40 CFR 63.114(d)(1)]

Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0055 MRE-103 - Direct Chlorination Reactor 3

308 [40 CFR 63.113(a)(2)]

Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0056 MTK-105 - Direct Chlorination Reactor Product Separator

313 [40 CFR 63.113(a)(2)]

Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER2008001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0056 MTK-105 - Direct Chlorination Reactor Product Separator

- Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0057 MCL-401 - EDC Purification Drying Column

- Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $<$ 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0058 MCL-402 - EDC Purification Lights Column

- Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $<$ 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0058 MCL-402 - EDC Purification Lights Column

326 [40 CFR 63.114(d)(1)] Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere. OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0059 MCL-403 - EDC Purification Hiball Column

Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens < 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere. OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0060 MCL-404 - EDC Purification Vacuum Column

Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens < 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-0018-V1

Air - Title V Regular Permit Minor Mod

EQT0060 MCL-404 - EDC Purification Vacuum Column

- 336 [40 CFR 63.114(d)(1)]
 Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0061 MCL-405 - EDC Purification Clean-up Column

- 338 [40 CFR 63.113(a)(2)]
 Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).
 Subpart G. [40 CFR 63.113(a)(2)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $<$ 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]
 Which Months: All Year Statistical Basis: None specified
 Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]
 Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0062 MCL-231 - Process Wastewater/ Storm Water Stripper 1

- 343 [40 CFR 61.65(b)(9)(i)]
 Inprocess wastewater (vinyl chloride $>$ 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
 Which Months: All Year Statistical Basis: None specified
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
 Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]
 Determine whether each wastewater stream requires control for Table 8 compounds by complying with the requirements in either 40 CFR 63.132(b)(1)(i) or (b)(1)(ii), and (b)(1)(iii). Subpart G. [40 CFR 63.132(b)(1)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER2008001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0062 MCL-231 - Process Wastewater/ Storm Water Stripper 1

Determine whether each wastewater stream requires control for Table 9 compounds by complying with the requirements in 40 CFR 63.132(b)(2)(i) or (b)(2)(ii), and (b)(2)(iii). Subpart G. [40 CFR 63.132(b)(2)]

Determine total annual average concentration of Table 9 compounds according to the procedures in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 9 compounds. Subpart G. [40 CFR 63.132(c)]

Determine annual average concentration for each Table 8 compound according to the procedures specified in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures specified in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 8 compounds. Subpart G. [40 CFR 63.132(d)]

Do not discard liquid or solid organic materials with a concentration of greater than 10,000 ppm of Table 9 compounds (as determined by analysis of the stream composition, engineering calculations, or process knowledge, according to the provisions of 40 CFR 63.144(b)) from a chemical manufacturing process unit to water or wastewater, unless the receiving stream is managed and treated as a Group 1 wastewater stream. Subpart G. [40 CFR 63.132(f)]

Operate and maintain a steam stripper that meets the requirements of 40 CFR 63.138(d)(1) through (d)(6). Subpart G. [40 CFR 63.138(d)] Demonstrate compliance with 40 CFR 63.138(b)(1), (c)(1), (e), (f), and/or (g) using the procedures in either 40 CFR 63.138(j)(1) or (j)(2), except as specified in 40 CFR 63.138(j)(3) or (h). Subpart G. [40 CFR 63.138(j)]

Residuals: Return the wastewater stream residual to the treatment process. Subpart G. [40 CFR 63.138(k)(2)] Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records specified in 40 CFR 63.147(a) through (f), as applicable. Subpart G.

Comply with the provisions of 40 CFR 63 Subpart G Table 35 for each item of equipment meeting all the criteria specified in 40 CFR 63.149(b) through (d) and either (e)(1) or (e)(2). Subpart G. [40 CFR 63.149(a)] Equipment/operational data recordkeeping by electronic or hard copy as needed. Maintain records to demonstrate that the criteria are being met for any exemption claimed. Maintain records on the premises for at least two years and make such information available to representatives of the Louisiana Department of Environmental Quality and the Environmental Protection Agency upon request.

Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

347 [40 CFR 63.132(b)(2)]
 348 [40 CFR 63.132(c)]
 349 [40 CFR 63.132(d)]
 350 [40 CFR 63.132(0)]
 351 [40 CFR 63.138(d)]
 352 [40 CFR 63.138(j)]
 353 [40 CFR 63.138(k)(2)]
 354 [40 CFR 63.147]
 355 [40 CFR 63.149(a)]
 356 [LAC 33:II.2115.K]
 357 [LAC 33:III.5109.A]

EQT0063 MCL-232 - Process Wastewater/ Storm Water Stripper 2

Inprocess wastewater (vinyl chloride > 10 ppm): Vinyl chloride \leq 10 ppm before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process, or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)] Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]

Determine whether each wastewater stream requires control for Table 9 compounds by complying with the requirements in 40 CFR 63.132(b)(2)(i) or (b)(2)(ii), and (b)(2)(iii). Subpart G. [40 CFR 63.132(b)(2)]

Determine total annual average concentration of Table 9 compounds according to the procedures in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 9 compounds. Subpart G. [40 CFR 63.132(c)]

Determine annual average concentration for each Table 8 compound according to the procedures specified in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures specified in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 8 compounds. Subpart G. [40 CFR 63.132(d)]

Do not discard liquid or solid organic materials with a concentration of greater than 10,000 ppm of Table 9 compounds (as determined by analysis of the stream composition, engineering calculations, or process knowledge, according to the provisions of 40 CFR 63.144(b)) from a chemical manufacturing process unit to water or wastewater, unless the receiving stream is managed and treated as a Group 1 wastewater stream. Subpart G. [40 CFR 63.132(f)]

Operate and maintain a steam stripper that meets the requirements of 40 CFR 63.138(d)(1) through (d)(6). Subpart G. [40 CFR 63.138(d)] Demonstrate compliance with 40 CFR 63.138(b)(1), (c)(1), (e), (f), and/or (g) using the procedures in either 40 CFR 63.138(j)(1) or (j)(2), except as specified in 40 CFR 63.138(j)(3) or (h). Subpart G. [40 CFR 63.138(j)]

Residuals: Return the wastewater stream residual to the treatment process. Subpart G. [40 CFR 63.138(k)(2)] Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records specified in 40 CFR 63.147(a) through (f), as applicable. Subpart G.

Comply with the provisions of 40 CFR 63 Subpart G Table 35 for each item of equipment meeting all the criteria specified in 40 CFR 63.149(b) through (d) and either (e)(1) or (e)(2). Subpart G. [40 CFR 63.149(a)] Equipment/operational data recordkeeping by electronic or hard copy as needed. Maintain records to demonstrate that the criteria are being met for any exemption claimed. Maintain records on the premises for at least two years and make such information available to representatives of the Louisiana Department of Environmental Quality and the Environmental Protection Agency upon request.

Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

358 [40 CFR 61.65(b)(9)(i)]
 359 [40 CFR 61.65(b)(9)(ii)]
 360 [40 CFR 63.132(a)(3)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0063 MCL-232 • Process Wastewater/ Storm Water Stripper 2

- Determine whether each wastewater stream requires control for Table 8 compounds by complying with the requirements in either 40 CFR 63.132(b)(1) or (b)(1)(i), and (b)(1)(ii). Subpart G. [40 CFR 63.132(b)(1)]
- Determine whether each wastewater stream requires control for Table 9 compounds by complying with the requirements in 40 CFR 63.132(b)(2)(i) or (b)(2)(ii), and (b)(2)(iii). Subpart G. [40 CFR 63.132(b)(2)]
- Determine total annual average concentration of Table 9 compounds according to the procedures in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 9 compounds. Subpart G. [40 CFR 63.132(c)]
- Determine annual average concentration for each Table 8 compound according to the procedures specified in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures specified in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 8 compounds. Subpart G. [40 CFR 63.132(d)]
- Do not discard liquid or solid organic materials with a concentration of greater than 10,000 ppm of Table 9 compounds (as determined by analysis of the stream composition, engineering calculations, or process knowledge, according to the provisions of 40 CFR 63.144(b)) from a chemical manufacturing process unit to water or wastewater, unless the receiving stream is managed and treated as a Group 1 wastewater stream. Subpart G. [40 CFR 63.132(f)]
- Operate and maintain a steam stripper that meets the requirements of 40 CFR 63.138(d)(1) through (d)(6). Subpart G. [40 CFR 63.138(d)]
- Demonstrate compliance with 40 CFR 63.138(b)(1); (c)(1), (e), (f), and/or (g) using the procedures in either 40 CFR 63.138(j)(1) or (j)(2), except as specified in 40 CFR 63.138(j)(3) or (h). Subpart G. [40 CFR 63.138(j)]
- Residuals: Return the wastewater stream residual to the treatment process. Subpart G. [40 CFR 63.138(k)(2)]
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records specified in 40 CFR 63.147(a) through (f), as applicable. Subpart G.
- Comply with the provisions of 40 CFR 63 Subpart G Table 35 for each item of equipment meeting all the criteria specified in 40 CFR 63.149(b) through (d) and either (e)(1) or (e)(2). Subpart G. [40 CFR 63.149(a)]
- Equipment/operational data recordkeeping by electronic or hard copy as needed. Maintain records to demonstrate that the criteria are being met for any exemption claimed. Maintain records on the premises for at least two years and make such information available to representatives of the Louisiana Department of Environmental Quality and the Environmental Protection Agency upon request.
- Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0064 MCL-631 • Process Area Wastewater Stripper 1

- Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride ≤ 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
- Which Months: All Year Statistical Basis: None specified
- Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(ii) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0064 MCL-631 - Process Area Wastewater Stripper 1

- 375 [40 CFR 63.132(a)(3)] Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]
- 376 [40 CFR 63.132(b)(1)] Determine whether each wastewater stream requires control for Table 8 compounds by complying with the requirements in either 40 CFR 63.132(b)(1)(i) or (b)(1)(ii), and (b)(1)(iii). Subpart G. [40 CFR 63.132(b)(1)]
- 377 [40 CFR 63.132(b)(2)] Determine whether each wastewater stream requires control for Table 9 compounds by complying with the requirements in 40 CFR 63.132(b)(2)(i) or (b)(2)(ii), and (b)(2)(iii). Subpart G. [40 CFR 63.132(b)(2)]
- 378 [40 CFR 63.132(c)] Determine total annual average concentration of Table 9 compounds according to the procedures in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 9 compounds. Subpart G. [40 CFR 63.132(c)]
- 379 [40 CFR 63.132(d)] Determine annual average concentration for each Table 8 compound according to the procedures specified in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures specified in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 8 compounds. Subpart G. [40 CFR 63.132(d)]
- 380 [40 CFR 63.132(f)] Do not discard liquid or solid organic materials with a concentration of greater than 10,000 ppm of Table 9 compounds (as determined by analysis of the stream composition, engineering calculations, or process knowledge, according to the provisions of 40 CFR 63.144(b)) from a chemical manufacturing process unit to water or wastewater, unless the receiving stream is managed and treated as a Group 1 wastewater stream. Subpart G. [40 CFR 63.132(f)]
- 381 [40 CFR 63.147] Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records specified in 40 CFR 63.147(a) through (f), as applicable. Subpart G.
- 382 [40 CFR 63.149(a)] Comply with the provisions of 40 CFR 63 Subpart G Table 35 for each item of equipment meeting all the criteria specified in 40 CFR 63.149(b) through (d) and either (e)(1) or (e)(2). Subpart G. [40 CFR 63.149(a)]
- 383 [LAC 33:III.215.K] Equipment/operational data recordkeeping by electronic or hard copy as needed. Maintain records to demonstrate that the criteria are being met for any exemption claimed. Maintain records on the premises for at least two years and make such information available to representatives of the Louisiana Department of Environmental Quality and the Environmental Protection Agency upon request.
- 384 [LAC 33:III.5109.A] Shall comply with 40 CFR 63 Subpart F - Determined as MACT.

EQT0065 MCL-632 - Process Area Wastewater Stripper 2

- 385 [40 CFR 61.65(b)(9)(i)] Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride ≤ 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
- 386 [40 CFR 61.65(b)(9)(ii)] Which Months: All Year Statistical Basis: None specified Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
- 387 [40 CFR 63.132(a)(3)] Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]
- 388 [40 CFR 63.132(b)(1)] Determine whether each wastewater stream requires control for Table 8 compounds by complying with the requirements in either 40 CFR 63.132(b)(1)(i) or (b)(1)(ii), and (b)(1)(iii). Subpart G. [40 CFR 63.132(b)(1)]

SPECIFIC REQUIREMENTS

AI ID: 126577 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER2008001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0065 MCL-632 - Process Area Wastewater Stripper 2

Determine whether each wastewater stream requires control for Table 9 compounds by complying with the requirements in 40 CFR 63.132(b)(2) or (b)(2)(i) or (b)(2)(ii), and (b)(2)(iii). Subpart G. [40 CFR 63.132(b)(2)]

Determine total annual average concentration of Table 9 compounds according to the procedures in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 9 compounds. Subpart G. [40 CFR 63.132(c)]

Determine annual average concentration for each Table 8 compound according to the procedures specified in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures specified in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 8 compounds. Subpart G. [40 CFR 63.132(d)]

Do not discard liquid or solid organic materials with a concentration of greater than 10,000 ppm of Table 9 compounds (as determined by analysis of the stream composition, engineering calculations, or process knowledge, according to the provisions of 40 CFR 63.144(b)) from a chemical manufacturing process unit to water or wastewater, unless the receiving stream is managed and treated as a Group 1 wastewater stream.

Subpart G. [40 CFR 63.132(f)]

Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records specified in 40 CFR 63.147(a) through (f), as applicable. Subpart G. Comply with the provisions of 40 CFR 63 Subpart G Table 35 for each item of equipment meeting all the criteria specified in 40 CFR 63.149(b) through (d) and either (e)(1) or (e)(2). Subpart G. [40 CFR 63.149(a)]

Equipment/operational data recordkeeping by electronic or hard copy as needed. Maintain records to demonstrate that the criteria are being met for any exemption claimed. Maintain records on the premises for at least two years and make such information available to representatives of the Louisiana Department of Environmental Quality and the Environmental Protection Agency upon request. Shall comply with 40 CFR 63 Subpart F - Determined as MACT.

EQT0066 VCLD-RC - VCM Railcar Loading Racks

Loading and unloading lines: Vinyl chloride $\leq 0.0038 \text{ m}^3 (0.13 \text{ ft}^3)$ at standard pressure, in all parts of each loading or unloading line that are to be opened to the atmosphere, after each loading or unloading operation and before opening a loading or unloading line to the atmosphere.

Subpart F. [40 CFR 61.65(b)(1)(i)]

Which Months: All Year Statistical Basis: None specified

Loading and unloading lines: Duct any vinyl chloride removed from a loading or unloading line in accordance with 40 CFR 61.65(b)(1)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(1)(ii)]

Slip gauges: Minimize vinyl chloride emissions during loading or unloading operations by ducting any vinyl chloride discharged from the slip gauge through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(2)]

Equip with a vapor collection system consisting of, at a minimum, a vapor return line which returns all vapors displaced during loading to the VOC dispensing vessel or to a disposal system.

Prevent spills during the attachment and disconnection of filling lines or arms. Equip loading and vapor lines with fittings which close automatically when disconnected, or equip to permit residual VOC in the loading line to discharge into a collection system or disposal or recycling system.

389 [40 CFR 63.132(b)(2)]

390 [40 CFR 63.132(c)]

391 [40 CFR 63.132(d)]

392 [40 CFR 63.132(f)]

393 [40 CFR 63.147]

394 [40 CFR 63.149(a)]

395 [LAC 33:III.2115.K]

396 [LAC 33:III.5109.A]

397 [40 CFR 61.65(b)(1)(ii)]

398 [40 CFR 61.65(b)(1)(ii)]

399 [40 CFR 61.65(b)(2)]

400 [LAC 33:III.2107.B]

401 [LAC 33:III.2107.B]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0066 VCLD-RC - VCM Railcar Loading Racks

- 402 [LAC 33:III.2107.B]
 VOC, Total \geq 90 % DRE, using a vapor disposal system.
 Which Months: All Year Statistical Basis: None specified
 Discontinue loading or unloading through the affected transfer lines when a leak is observed; do not resume loading or unloading until the observed leak is repaired.
- 403 [LAC 33:III.2107.C]
 VOC, Total monitored by visual, audible, and/or olfactory during loading or unloading, to detect leaks.
- 404 [LAC 33:III.2107.C]
 Which Months: All Year Statistical Basis: None specified
 Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records of the information specified in LAC 33:III.2107.D.1 and 2.
- 405 [LAC 33:III.2107.D]
 Determine compliance with LAC 33:III.2107.B using the methods in LAC 33:III.2107.E.1 through 5, as appropriate.
- 406 [LAC 33:III.2107.E]
 Vents from all loading lines shall be routed to the thermal oxidizers - Determined as MACT.
- 407 [LAC 33:III.5109.A]

EQT0067 VCLD-SD - VCM Marine Loading Racks

- 408 [40 CFR 61.65(b)(1)(i)]
 Loading and unloading lines: Vinyl chloride $\leq 0.0038 \text{ m}^3 / (0.13 \text{ ft}^3)$ at standard pressure, in all parts of each loading or unloading line that are to be opened to the atmosphere, after each loading or unloading operation and before opening a loading or unloading line to the atmosphere.
- 409 [40 CFR 61.65(b)(1)(ii)]
 Which Months: All Year Statistical Basis: None specified
 Loading and unloading lines: Duct any vinyl chloride removed from a loading or unloading line in accordance with 40 CFR 61.65(b)(1)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(1)(iii)]
- 410 [40 CFR 61.65(b)(2)]
 Slip gauges: Minimize vinyl chloride emissions during loading or unloading operations by ducting any vinyl chloride discharged from the slip gauge through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(2)]
- 411 [LAC 33:III.2108.C.1]
 Equip with a vapor collection system designed to collect the organic compounds vapors displaced from ships and/or barges during loading.
- 412 [LAC 33:III.2108.C.2]
 VOC, Total \geq 90 % reduction by weight by collecting and processing the vapors with a recovery and/or destruction system.
- 413 [LAC 33:III.2108.C.5]
 Which Months: All Year Statistical Basis: None specified
 Load only into ships and/or barges equipped with vapor collection equipment that is compatible with the affected facility's vapor collection system.
- 414 [LAC 33:III.2108.C.6]
 Properly connect the vapor collection and disposal system to the ships and/or barges before any loading is done.
- 415 [LAC 33:III.2108.D.4]
 Comply with the requirements of LAC 33:III.2108 as soon as practicable, but in no event later than one year from the promulgation of the regulation revision, if subject to LAC 33:III.2108 as a result of a revision of LAC 33:III.2108.
- 416 [LAC 33:III.2108.E]
 Determine compliance with LAC 33:III.2108.C.3 using the methods in LAC 33:III.2108.E.1-5, as appropriate.
- 417 [LAC 33:III.2108.F.1]
 Submit test results: Due to the Office of Environmental Assessment, Environmental Technology Division within 45 days of any testing done in accordance with LAC 33:III.2108.E.
- 418 [LAC 33:III.2108.F.2]
 Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records of the information specified in LAC 33:III.2108.F.2.a-c, as applicable.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0067 VCLD-SD - VCM Marine Loading Racks

- 419 [LAC 33:III.2108.G.1]
 Loading gasoline, crude oil or other VOCs into ships or barges is prohibited unless all loading and vapor lines, arms and hoses are equipped with fittings which make vapor-tight connections and provide tight shut-off when disconnected.
 Prevent spills or leaks during attachment or disconnection of filling lines, hoses or arms. Do not spill liquids or handle in any other manner that would result in evaporation to the atmosphere.
- 420 [LAC 33:III.2108.G.2]
 Maintain all equipment associated with the loading of gasoline, crude oil or other VOC into ships or barges to be leak-free, gas-tight and in good working order.
- 421 [LAC 33:III.2108.G.3]
 Vents from all loading lines shall be routed to the thermal oxidizers - Determined as MACT.

EQT0068 EDLD-SD - EDC Marine Loading Racks

- 423 [LAC 33:III.2108.C.1]
 Equip with a vapor collection system designed to collect the organic compounds vapors displaced from ships and/or barges during loading.
 VOC, Total \geq 90 % reduction by weight by collecting and processing the vapors with a recovery and/or destruction system.
 Which Months: All Year Statistical Basis: None specified
424. [LAC 33:III.2108.C.2]
 Load only into ships and/or barges equipped with vapor collection equipment that is compatible with the affected facility's vapor collection system.
- 425 [LAC 33:III.2108.C.5]
 Properly connect the vapor collection and disposal system to the ships and/or barges before any loading is done.
- 426 [LAC 33:III.2108.C.6]
 Comply with the requirements of LAC 33:III.2108 as soon as practicable, but in no event later than one year from the promulgation of the regulation revision, if subject to LAC 33:III.2108 as a result of a revision of LAC 33:III.2108.
- 427 [LAC 33:III.2108.D.4]
 Determine compliance with LAC 33:III.2108.C.3 using the methods in LAC 33:III.2108.E.1-5, as appropriate.
- 428 [LAC 33:III.2108.E]
 Submit test results: Due to the Office of Environmental Assessment, Environmental Technology Division within 45 days of any testing done in accordance with LAC 33:III.2108.E.
- 429 [LAC 33:III.2108.F.1]
 Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records of the information specified in LAC 33:III.2108.F.2.a-e, as applicable.
- 430 [LAC 33:III.2108.F.2]
 Loading gasoline, crude oil or other VOCs into ships or barges is prohibited unless all loading and vapor lines, arms and hoses are equipped with fittings which make vapor-tight connections and provide tight shut-off when disconnected.
- 431 [LAC 33:III.2108.G.1]
 Prevent spills or leaks during attachment or disconnection of filling lines, hoses or arms. Do not spill liquids or handle in any other manner that would result in evaporation to the atmosphere.
- 432 [LAC 33:III.2108.G.2]
 Maintain all equipment associated with the loading of gasoline, crude oil or other VOC into ships or barges to be leak-free, gas-tight and in good working order.
- 433 [LAC 33:III.2108.G.3]
 Vents from all loading lines shall be routed to the thermal oxidizers - Determined as MACT.

EQT0069 MTK491 - EDC Intermediate Storage No. 1

- Inlet emissions: Organic HAP \geq 95 % reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
 Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0069 MTK-491 - EDC Intermediate Storage No. 1

- 436 [40 CFR 63.119(e)(3)] Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G [40 CFR 63.119(e)(3)]
- 437 [40 CFR 63.120(d)(1)] Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- 438 [40 CFR 63.120(d)(5)] Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status. Subpart G. [40 CFR 63.120(d)(5)]
- 439 [40 CFR 63.120(d)] Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and the information specified in 40 CFR 63.120(d)(3)(i) and, if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
- 440 [40 CFR 63.122(a)(3)] Submit a Notification of Compliance Status as required by 40 CFR 63.152(b). Include the information specified in 40 CFR 63.122(c). Subpart G. [40 CFR 63.122(a)(3)]
- 441 [40 CFR 63.122(a)(4)] Submit Periodic Reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(d), (e), (f), and (g). Subpart G.
- 442 [40 CFR 63.123] Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (h), as applicable. Keep the records as long as the storage vessel retains Group I status and is in operation. Subpart G.
- 443 [40 CFR 63.127(a)(1)] Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.127(a)(1)]
- 444 [LAC 33.III.2103.B] Which Months: All Year Statistical Basis: None specified Equip with a submerged fill pipe.
- 445 [LAC 33.III.2103.B] Maintain working pressures sufficient at all times under normal operating conditions to prevent vapor or gas loss to the atmosphere.
- 446 [LAC 33.III.2103.E.1] VOC, Total \geq 95 % control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.
- 447 [LAC 33.III.2103.E] Which Months: All Year Statistical Basis: None specified Equip with a vapor loss control system, consisting of a gathering system capable of collecting volatile organic compound vapors and a vapor disposal system capable of processing such organic vapors. All tank gauging and sampling devices shall be gas-tight except when gauging or sampling is taking place.
- 448 [LAC 33.III.2103.H.3] Determine VOC maximum true vapor pressure using the methods in LAC 33.III.2103.H.3-a.
- 449 [LAC 33.III.2103.I.] Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in LAC 33.III.2103.I.1 - 7, as applicable.
- 450 [LAC 33.III.5109.A] Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

EQT0070 MTK-492 - EDC Intermediate Storage No. 2

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0070 MTK-492 - EDC Intermediate Storage No. 2

- Inlet emissions: Organic HAP $\geq 95\%$ reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
- Which Months: All Year Statistical Basis: None specified
- Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
- Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status.
- Subpart G. [40 CFR 63.120(d)(5)]
- Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and the information specified in 40 CFR 63.120(d)(3)(i) and, if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
- Submit a Notification of Compliance Status as required by 40 CFR 63.152(b). Include the information specified in 40 CFR 63.122(c). Subpart G. [40 CFR 63.122(a)(3)]
- Submit Periodic Reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(d), (e), (f), and (g). Subpart G. [40 CFR 63.122(a)(4)]
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (h), as applicable. Keep the records as long as the storage vessel retains Group 1 status and is in operation.
- Subpart G.
- Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs.
- Subpart G. [40 CFR 63.127(a)(1)]
- Which Months: All Year Statistical Basis: None specified
- Equip with a submerged fill pipe.
- Maintain working pressures sufficient at all times under normal operating conditions to prevent vapor or gas loss to the atmosphere.
- VOC, Total $\geq 95\%$ control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.
- Which Months: All Year Statistical Basis: None specified
- Equip with a vapor loss control system, consisting of a gathering system capable of collecting volatile organic compound vapors and a vapor disposal system capable of processing such organic vapors. All tank gauging and sampling devices shall be gas-tight except when gauging or sampling is taking place.
- Determine VOC maximum true vapor pressure using the methods in LAC 33:III.2103.H.3.a-e.
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in LAC 33:III.2103.I.1 - 7, as applicable.
- Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0071 MTK-493 - EDC Intermediate Storage No. 3

- 467 [40 CFR 63.119(e)(1)] Inlet emissions: Organic HAP \geq 95 % reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
- Which Months: All Year Statistical Basis: None specified
- Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(c)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
- Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status Subpart G. [40 CFR 63.120(d)(5)]
- Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and the information specified in 40 CFR 63.120(d)(3)(i) and, if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
- Submit a Notification of Compliance Status as required by 40 CFR 63.152(b). Include the information specified in 40 CFR 63.122(c). Subpart G. [40 CFR 63.122(a)(3)]
- Submit Periodic Reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(d), (e), (f), and (g). Subpart G. [40 CFR 63.122(a)(4)]
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (h), as applicable. Keep the records as long as the storage vessel retains Group 1 status and is in operation. Subpart G.
- Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.127(a)(1)]
- Which Months: All Year Statistical Basis: None specified
- Equip with a submerged fill pipe.
- Maintain working pressures sufficient at all times under normal operating conditions to prevent vapor or gas loss to the atmosphere.
- VOC, Total \geq 95 % control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.
- Which Months: All Year Statistical Basis: None specified
- Equip with a vapor loss control system, consisting of a gathering system capable of collecting volatile organic compound vapors and a vapor disposal system capable of processing such organic vapors. All tank gauging and sampling devices shall be gas-tight except when gauging or sampling is taking place.
- Determine VOC maximum true vapor pressure using the methods in LAC 33:III.2103.H.3.a-e.
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in LAC 33:III.2103.I.1 - 7, as applicable.
- Shall comply with 40 CFR 63 Subpart G - Determined as MACT.
- 475 [40 CFR 63.127(a)(1)]
- 476 [LAC 33:III.2103.B]
- 477 [LAC 33:III.2103.B]
- 478 [LAC 33:III.2103.E.1]
- 479 [LAC 33:III.2103.E]
- 480 [LAC 33:III.2103.H.3]
- 481 [LAC 33:III.2103.I]
- 482 [LAC 33:III.5109.A]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0072 MTK-494 - EDC Intermediate Storage No. 4

- 483 [40 CFR 63.119(e)(1)] Inlet emissions: Organic HAP >= 95 % reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b); Subpart G. [40 CFR 63.119(e)(1)]
- Which Months: All Year Statistical Basis: None specified
- Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
- Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status. Subpart G. [40 CFR 63.120(d)(5)]
- Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and the information specified in 40 CFR 63.120(d)(3)(i) and, if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
- Submit a Notification of Compliance Status as required by 40 CFR 63.152(b). Include the information specified in 40 CFR 63.122(c). Subpart G. [40 CFR 63.122(a)(3)]
- Submit Periodic Reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(d), (e), (f), and (g). Subpart G. [40 CFR 63.122(a)(4)]
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (h), as applicable. Keep the records as long as the storage vessel retains Group 1 status and is in operation. Subpart G.
- Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.127(a)(1)]
- Which Months: All Year Statistical Basis: None specified
- Equip with a submerged fill pipe.
- Maintain working pressures sufficient at all times under normal operating conditions to prevent vapor or gas loss to the atmosphere. VOC, Total >= 95 % control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.
- Which Months: All Year Statistical Basis: None specified
- Equip with a vapor loss control system, consisting of a gathering system capable of collecting volatile organic compound vapors and a vapor disposal system capable of processing such organic vapors. All tank gauging and sampling devices shall be gas-tight except when gauging or sampling is taking place.
- Determine VOC maximum true vapor pressure using the methods in LAC 33:III.2103.H.3.a-e.
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in LAC 33:III.2103.I.1 - 7, as applicable.
- Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER2008 0001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0073 MTK-495 - EDC Intermediate Storage No. 5

- Inlet emissions: Organic HAP $\geq 95\%$ reduction, except as provided in 40 CFR 63.111(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
- Which Months: All Year Statistical Basis: None specified
 Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
- Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status. Subpart G. [40 CFR 63.120(d)(5)]
- Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and the information specified in 40 CFR 63.120(d)(3)(i) and, if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
- Submit a Notification of Compliance Status as required by 40 CFR 63.152(b). Include the information specified in 40 CFR 63.122(c). Subpart G. [40 CFR 63.122(a)(3)]
- Submit Periodic Reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(d), (e), (f), and (g). Subpart G. [40 CFR 63.122(a)(4)]
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (h), as applicable. Keep the records as long as the storage vessel retains Group 1 status and is in operation. Subpart G.
- Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.127(a)(1)]
- Which Months: All Year Statistical Basis: None specified
 Equip with a submerged fill pipe.
- Maintain working pressures sufficient at all times under normal operating conditions to prevent vapor or gas loss to the atmosphere. VOC, Total $\geq 95\%$ control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.
- Which Months: All Year Statistical Basis: None specified
 Equip with a vapor loss control system, consisting of a gathering system capable of collecting volatile organic compound vapors and a vapor disposal system capable of processing such organic vapors. All tank gauging and sampling devices shall be gas-tight except when gauging or sampling is taking place.
- Determine VOC maximum true vapor pressure using the methods in LAC 33.III.2.103.H.3-a-e.
 Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in LAC 33.III.2.103.I.1 - 7, as applicable.
- Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0074 MTK-496 - By-Product Storage

515 [40 CFR 61.343(a)(1)(i)(A)]

Fixed roof: Ensure that the cover and all openings are designed to operate with no detectable emissions as indicated by an instrument reading less than 500 ppmv above background, as determined initially and thereafter at least once per year by the methods specified in 40 CFR 61.355(l). Subpart FF. [40 CFR 61.343(a)(1)(i)(A)]

516 [40 CFR 61.343(a)(1)(i)(B)]

Fixed roof: Maintain each opening in a closed, sealed position at all times that waste is in the tank except when it is necessary to use the opening for waste sampling or removal, or for equipment inspection, maintenance, or repair, except as specified in 40 CFR 61.343(a)(1)(i)(C). Subpart FF. [40 CFR 61.343(a)(1)(i)(B)]

517 [40 CFR 61.343(a)(1)]

Install, operate, and maintain a fixed-roof and closed-vent system that routes all organic vapors vented from the tank to a control device. Subpart FF. [40 CFR 61.343(a)(1)]

518 [40 CFR 61.343(c)]

Fixed-roof: Equipment/operational data monitored by visual inspection/determination once initially and once every quarter thereafter to ensure that no cracks or gaps occur and that access doors and other openings are closed and gasketed properly. Subpart FF. [40 CFR 61.343(c)]

519 [40 CFR 61.343(d)]

Which Months: All Year Statistical Basis: None specified
Make first efforts at repair as soon as practicable, but not later than 45 calendar days after a broken seal or gasket or other problem is identified, or when detectable emissions are measured, except as provided in 40 CFR 61.350. Subpart FF. [40 CFR 61.343(d)]

520 [40 CFR 61.355]

Determine compliance with 40 CFR 61 Subpart FF using the test methods and procedures specified in 40 CFR 61.355(a) through (i), as applicable. Subpart FF.

521 [40 CFR 61.356]

Equipment/operational data recordkeeping by electronic or hard copy continuously Maintain records as specified in 40 CFR 61.356(a) through (n). Maintain each record in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. Subpart FF.

522 [40 CFR 63.119(e)(1)]

Inlet emissions: Organic HAP \geq 95 % reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]

523 [40 CFR 63.119(e)(3)]

Which Months: All Year Statistical Basis: None specified
Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]

524 [40 CFR 63.120(d)(1)]

Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]

525 [40 CFR 63.120(d)(5)]

Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status. Subpart G. [40 CFR 63.120(d)(5)]

526 [40 CFR 63.120(d)]

Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and the information specified in 40 CFR 63.120(d)(3)(i) and, if applicable,

527 [40 CFR 63.122(a)(3)]

(d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
G. [40 CFR 63.122(a)(3)]

528 [40 CFR 63.122(a)(4)]

Submit Periodic Reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(d), (e), (f), and (g). Subpart G. [40 CFR 63.122(a)(4)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0074 MTK-496 - By-Product Storage

Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (h), as applicable. Keep the records as long as the storage vessel retains Group 1 status and is in operation. Subpart G.

Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.127(a)(1)]

Which Months: All Year Statistical Basis: None specified

Equip with a submerged fill pipe.

Maintain working pressures sufficient at all times under normal operating conditions to prevent vapor or gas loss to the atmosphere. VOC, Total >= 95 % control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.

Which Months: All Year Statistical Basis: None specified

Equip with a vapor loss control system, consisting of a gathering system capable of collecting volatile organic compound vapors and a vapor disposal system capable of processing such organic vapors. All tank gauging and sampling devices shall be gas-tight except when gauging or sampling is taking place.

Determine VOC maximum true vapor pressure using the methods in LAC 33.III.2|03.H.3-a-c.

Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in LAC 33.III.2|03.I.1 - 7, as applicable.

Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

EQT0075 MTK-499A - By-Product Tank No. 1

Fixed roof: Ensure that the cover and all openings are designed to operate with no detectable emissions as indicated by an instrument reading less than 500 ppmv above background, as determined initially and thereafter at least once per year by the methods specified in 40 CFR 61.355(h). Subpart FF. [40 CFR 61.343(a)(1)(i)(A)]

Fixed roof: Maintain each opening in a closed, sealed position at all times that waste is in the tank except when it is necessary to use the opening for waste sampling or removal, or for equipment inspection, maintenance, or repair, except as specified in 40 CFR 61.343(a)(1)(i)(C). Subpart FF. [40 CFR 61.343(a)(1)(i)(B)]

Install, operate, and maintain a fixed-roof and closed-vent system that routes all organic vapors vented from the tank to a control device. Subpart FF. [40 CFR 61.343(a)(1)(i)(B)]

Fixed-roof: Equipment/operational data monitored by visual inspection/determination once initially and once every quarter thereafter to ensure that no cracks or gaps occur and that access doors and other openings are closed and gasketed properly. Subpart FF. [40 CFR 61.343(c)]

Which Months: All Year Statistical Basis: None specified

Make first efforts at repair as soon as practicable, but not later than 45 calendar days after a broken seal or gasket or other problem is identified, or when detectable emissions are measured, except as provided in 40 CFR 61 Subpart FF. [40 CFR 61.343(d)]

Determine compliance with 40 CFR 61 Subpart FF using the test methods and procedures specified in 40 CFR 61.355(a) through (i), as applicable. Subpart FF.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Mirror Mod

EQT0075 MTK-499A - By-Product Tank No. 1

- Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records as specified in 40 CFR 61.356(a) through (n). Maintain each record in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. Subpart FF.
- Inlet emissions: Organic HAP $\geq 95\%$ reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
- Which Months: All Year Statistical Basis: None specified
- Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
- Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status. Subpart G. [40 CFR 63.120(d)(5)]
- Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and the information specified in 40 CFR 63.120(d)(3)(i) and, if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (h), as applicable. Keep the records as long as the storage vessel retains Group I status and is in operation. Subpart G.
- Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.127(a)(1)]
- Which Months: All Year Statistical Basis: None specified
- Equip with a submerged fill pipe.
- Maintain working pressures sufficient at all times under normal operating conditions to prevent vapor or gas loss to the atmosphere.
- VOC, Total $\geq 95\%$ control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.
- Which Months: All Year Statistical Basis: None specified
- Equip with a vapor loss control system, consisting of a gathering system capable of collecting volatile organic compound vapors and a vapor disposal system capable of processing such organic vapors. All tank gauging and sampling devices shall be gas-tight except when gauging or sampling is taking place.
- Determine VOC maximum true vapor pressure using the methods in LAC 33.III.2103.H.3-a-e.
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in LAC 33.III.2103.I.1 - 7, as applicable.
- Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

EQT0076 MTK-499B - By-Product Tank No. 2

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0076 MTK499B - By-Product Tank No. 2

- 559 [40 CFR 61.343(a)(1)(i)(A)]
 Fixed roof. Ensure that the cover and all openings are designed to operate with no detectable emissions as indicated by an instrument reading less than 500 ppmv above background, as determined initially and thereafter at least once per year by the methods specified in 40 CFR 61.355(f). Subpart FF. [40 CFR 61.343(a)(1)(i)(A)]
- 560 [40 CFR 61.343(a)(1)(i)(B)]
 Fixed roof: Maintain each opening in a closed, sealed position at all times that waste is in the tank except when it is necessary to use the opening for waste sampling or removal, or for equipment inspection, maintenance, or repair, except as specified in 40 CFR 61.343(a)(1)(i)(C). Subpart FF. [40 CFR 61.343(a)(1)(i)(B)]
- 561 [40 CFR 61.343(a)(1)]
 Install, operate, and maintain a fixed-roof and closed-vent system that routes all organic vapors vented from the tank to a control device. Subpart FF. [40 CFR 61.343(a)(1)]
- 562 [40 CFR 61.343(c)]
 Fixed-roof: Equipment/operational data monitored by visual inspection/determination once initially and once every quarter thereafter to ensure that no cracks or gaps occur and that access doors and other openings are closed and gasketed properly. Subpart FF. [40 CFR 61.343(c)]
- 563 [40 CFR 61.343(d)]
 Which Months: All Year Statistical Basis: None Specified
 Make first efforts at repair as soon as practicable, but not later than 45 calendar days after a broken seal or gasket or other problem is identified, or when detectable emissions are measured, except as provided in 40 CFR 61.350. Subpart FF. [40 CFR 61.343(d)]
- 564 [40 CFR 61.355]
 Determine compliance with 40 CFR 61 Subpart FF using the test methods and procedures specified in 40 CFR 61.355(a) through (i), as applicable. Subpart FF.
- 565 [40 CFR 61.356]
 Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records as specified in 40 CFR 61.356(a) through (n). Maintain each record in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. Subpart FF.
- 566 [40 CFR 63.119(e)(1)]
 Inlet emissions: Organic HAP > 95 % reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
- 567 [40 CFR 63.119(e)(3)]
 Which Months: All Year Statistical Basis: None Specified
 Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
- 568 [40 CFR 63.120(d)(1)]
 Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- 569 [40 CFR 63.120(d)(5)]
 Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status. Subpart G. [40 CFR 63.120(d)(5)]
- 570 [40 CFR 63.120(d)]
 Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and the information specified in 40 CFR 63.120(d)(3)(i) and, if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
- 571 [40 CFR 63.122(a)(3)]
 Submit a Notification of Compliance Status as required by 40 CFR 63.152(b). Include the information specified in 40 CFR 63.122(c). Subpart G. [40 CFR 63.122(a)(3)]
- 572 [40 CFR 63.122(a)(4)]
 Submit Periodic Reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(d), (e), (f), and (g). Subpart G. [40 CFR 63.122(a)(4)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0076 MTK-499B - By-Product Tank No. 2

Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (h), as applicable. Keep the records as long as the storage vessel retains Group 1 status and is in operation.
Subpart G.

Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs.
Subpart G. [40 CFR 63.127(a)(1)]

Which Months: All Year Statistical Basis: None specified

Equip with a submerged fill pipe.

Maintain working pressures sufficient at all times under normal operating conditions to prevent vapor or gas loss to the atmosphere.
VOC, Total \geq 95 % control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.

Which Months: All Year Statistical Basis: None specified

Equip with a vapor loss control system, consisting of a gathering system capable of collecting volatile organic compound vapors and a vapor disposal system capable of processing such organic vapors. All tank gauging and sampling devices shall be gas-tight except when gauging or sampling is taking place.

Determine VOC maximum true vapor pressure using the methods in LAC 33:III.2103.H.3.a-e.

Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in LAC 33:III.2103.I.1 - 7, as applicable.
Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

EQT0077 MTK-719A - Wastewater Tank No. 1

Equipment/operational data recordkeeping by electronic or hard copy at the approved frequency. Keep readily accessible records showing the dimension of the storage vessel and an analysis showing the capacity of the storage vessel. Keep copies of all records for the life of the source as specified by 40 CFR 60.116b(a). Subpart Kb. [40 CFR 60.116b(b)]

Reduce hazardous air pollutants emissions to the atmosphere either by operating and maintaining a fixed roof and internal floating roof, an external floating roof, an external floating roof converted to an internal floating roof, a closed-vent system and control device, routing the emissions to a process or a fuel gas system, or vapor balancing in accordance with the requirements in 40 CFR 63.119(a)(1)
or equivalent as provided in 40 CFR 63.121. Subpart G. [40 CFR 63.119(a)(1)]

Inlet emissions: Organic HAP \geq 95 % reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

EQT0078 MTK-719B - Wastewater Tank No. 2

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0078 MTK-719B - Wastewater Tank No. 2

Equipment/operational data recordkeeping by electronic or hard copy at the approved frequency. Keep readily accessible records showing the dimension of the storage vessel and an analysis showing the capacity of the storage vessel. Keep copies of all records for the life of the source as specified by 40 CFR 60.116(b)(a). Subpart Kb. [40 CFR 60.116(b)]

Reduce hazardous air pollutants emissions to the atmosphere either by operating and maintaining a fixed roof and internal floating roof, an external floating roof, an external floating roof converted to an internal floating roof, a closed-vent system and control device, routing the emissions to a process or a fuel gas system, or vapor balancing in accordance with the requirements in 40 CFR 63.119(b), (c), (d), (e), (f), or (g) or equivalent as provided in 40 CFR 63.121. Subpart G. [40 CFR 63.119(a)(1)]

Inlet emissions: Organic HAP > 95 % reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.111(b). Subpart G. [40 CFR 63.119(e)(1)]
 Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
 Shall comply with 40 CFR 63 Subpart G - Determined as MACT.

EQT0079 MDCW-1 - Acidic Washing Water from Direct Chlorination

Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]

Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0080 MDCW-2 - Caustic Washing Water from Direct Chlorination

Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]

Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0081 MOHCW-1 - Byproduct Water from OHCl Train 1

Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride <= 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

SPECIFIC REQUIREMENTS**AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant****Activity Number: PER20080001****Permit Number: 1280-00118-V1****Air - Title V Regular Permit Minor Mod****EQT0082 MOHCW-2 - Byproduct Water from OHC Train 2**

600 [40 CFR 61.65(b)(9)(i)]
 Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

601 [40 CFR 61.65(b)(9)(ii)]
 Which Months: All Year Statistical Basis: None specified
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
 Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0083 MOHCW-3 - Byproduct Water from OHC Train 3

604 [40 CFR 61.65(b)(9)(i)]
 Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

605 [40 CFR 61.65(b)(9)(ii)]
 Which Months: All Year Statistical Basis: None specified
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
 Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0085 MEP-1 - Water from Drying Column in EDC Purification Train

608 [40 CFR 61.65(b)(9)(i)]
 Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

609 [40 CFR 61.65(b)(9)(ii)]
 Which Months: All Year Statistical Basis: None specified
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
 Comply with the applicable recordkeeping and reporting requirements specified in 40 CFR 63.146(b)(1) and 147(b)(8). Subpart G. [40 CFR 63.132(a)(3)]
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0086 MGTO-1 - Thermal Oxidizer A and Scrubber Bottoms Wastewater

612 [LAC 33-III.5109.A]

Wastewater shall be routed to the wastewater treatment system, FUG005 - Determined as MACT.

EQT0087 MGTO-2 - Thermal Oxidizer B and Scrubber Bottoms Wastewater

613 [LAC 33-III.5109.A]

Wastewater shall be routed to the wastewater treatment system, FUG005 - Determined as MACT.

EQT0088 MSW - Process Area Stormwater and Maintenance Wastewater

614 [40 CFR 63.102(a)]

Comply with the requirements of 40 CFR 63 Subparts G and H. Subpart F. [40 CFR 63.102(a)]

Maintenance wastewater: Implement the procedures described in 40 CFR 63.105(b) and (c) as part of the start-up, shutdown and malfunction plan required under 40 CFR 63.6(e)(3). Subpart F. [40 CFR 63.105(d)]

Maintenance wastewater: Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain a record of the information required by 40 CFR 63.105(b) and (c) as part of the start-up, shutdown, and malfunction plan required under 40 CFR 63.6(e)(3). Subpart F. [40 CFR 63.105(e)]

Maintenance wastewater: Prepare a description of maintenance procedures for the management of wastewaters generated from the emptying and purging of equipment in the process during temporary shutdowns for inspections, maintenance, and repair and during periods which are not shutdowns as specified in 40 CFR 63.105(b)(1) through (b)(3). Modify and update the information required by 40 CFR 63.105(b) as needed following each maintenance procedure based on the actions taken and the wastewaters generated in the preceding maintenance procedure. Subpart F.

618 [LAC 33-III.5109.A]

Shall comply with 40 CFR 63 Subpart F - Determined as MACT.

EQT0089 M-13 - Analyzer Vent - Unused Samples

619 [40 CFR 63.113(e)(2)]

Organic HAP >= 98 % reduction by weight, or <= 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c). Subpart G. [40 CFR 63.113(a)(2)]

Which Months: All Year Statistical Basis: None Specified

620 [40 CFR 63.113(c)(1)(i)]

Halogenated vent streams: Hydrogen halides and halogens >= 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens < 0.45 kg/hr, whichever is less stringent, using a halogen reduction device. Subpart G. [40 CFR 63.113(c)(1)(i)]

Which Months: All Year Statistical Basis: None Specified

621 [40 CFR 63.113(c)(1)]

Halogenated vent streams: Convey vent stream exiting a combustion device to a halogen reduction device, such as a scrubber, before being discharged to the atmosphere. Subpart G. [40 CFR 63.113(c)(1)]

Bypass lines: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any bypass line that could divert the gas stream to the atmosphere; OR Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the non-diverting position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.114(d)(1), 40 CFR 63.114(d)(2)]

Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep up-to-date, readily accessible records of the data specified in 40 CFR 63.117(a) through (a)(8), as applicable. Subpart G. [40 CFR 63.117(a)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0090 P-ST - Slurry Tank

624 [40 CFR 61.64(b)]

Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.65(a). Subpart F. [40 CFR 61.64(b)]

625 [40 CFR 61.67(a)(2)]

Which Months: All Year Statistical Basis: Three-hour average
Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

626 [40 CFR 61.67(f)]

Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(f)]

627 [40 CFR 61.67(e)]

Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]

628 [40 CFR 61.67(f)]

Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]

629 [40 CFR 61.68(c)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

630 [40 CFR 61.68(d)]

Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

631 [40 CFR 61.68(f)]

Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]

632 [40 CFR 61.68]

Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.

633 [40 CFR 61.71(a)]

Which Months: All Year Statistical Basis: None specified
Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]
Vent shall be routed to the Gas holder No. 1 (EQT093) and then the VCM Recovery System (EQT096, EQT097).**EQT0091 P-SS - Slurry Stripper**

635 [40 CFR 61.64(b)]

Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.65(a). Subpart F. [40 CFR 61.64(b)]

636 [40 CFR 61.64(e)]

Which Months: All Year Statistical Basis: Three-hour average
Daily average and 90 day rolling average (weight of VCM/weight of PVC) of residual Vinyl chloride recordkeeping by electronic or hard copy continuously. [40 CFR 61.64(e)]

637 [40 CFR 61.64(e)]

Vinyl chloride monitored by calculations daily. [40 CFR 61.64(e)]
Which Months: All Year Statistical Basis: 90 Day average

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0091 P-SS - Slurry Stripper

- 638 [40 CFR 61.64(c)] Vinyl chloride monitored by measurement three times per day (weight of VCM/weight of PVC) - using method specified in 61.67(g)(3), 61.70(c)(2) and the equation in 61.70(c)(2)(v). [40 CFR 61.64(e)]
- Which Months: All Year Statistical Basis: Daily average
- Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride $\leq 10 \text{ ppmw}$ before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
- Which Months: All Year Statistical Basis: None specified
- Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
- Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
- Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
- Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
- Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
- Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(3), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.
- Which Months: All Year Statistical Basis: None specified
- Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]
- 648 [40 CFR 61.68]
- 649 [40 CFR 61.71(a)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0091 P-SS - Slurry Stripper

- 650 [LAC 33:III.501.C.6] Methanol <= 10 ppmw (weight of methanol / weight of PVC).
 Which Months: All Year Statistical Basis: Annual average
 Vent shall be routed to the Gas holder No. 1 (EQT093) and then the VCM Recovery System (EQT096, EQT097).
- 651 [LAC 33:III.5109.A] Vinyl chloride <= 125 ppmw (weight of VCM / weight of PVC) - Determined as MACT.
- 652 [LAC 33:III.5109.A] Which Months: All Year Statistical Basis: Daily average
 Vinyl chloride <= 27 ppmw (weight of VCM / weight of PVC) - Determined as MACT.
- 653 [LAC 33:III.5109.A] Which Months: All Year Statistical Basis: Quarterly rolling average

EQT0092 P-RS - VCM Receiver System

- 654 [40 CFR 61.64(c)] Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.65(a). Subpart F. [40 CFR 61.64(c)]
 Which Months: All Year Statistical Basis: Three-hour average
 Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
- 655 [40 CFR 61.67(a)(2)] Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- 656 [40 CFR 61.67(e)] Submit test results; Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(c)]
- 657 [40 CFR 61.67(e)] Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- 658 [40 CFR 61.67(f)] Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
- 659 [40 CFR 61.68(c)] Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(n) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
- 660 [40 CFR 61.68(d)] Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
- 661 [40 CFR 61.68(f)] Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.
- 662 [40 CFR 61.68] Which Months: All Year Statistical Basis: None specified
 Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]
- 663 [40 CFR 61.71(a)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0092 P-RS - VCM Receiver System

664 [LAC 33:III.5|09.A] Vents shall be routed to the VCM Recovery Units, EQT096 and EQT097 - Determined as MACT

EQT0093 P-GH1 - Gas Holder No. 1

665 [40 CFR 61.64(d)] Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.65(a). Subpart F. [40 CFR 61.64(d)]

666 [40 CFR 61.67(a)(2)] Which Months: All Year Statistical Basis: Three-hour average Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

667 [40 CFR 61.67(b)] Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]

668 [40 CFR 61.67(e)] Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)] Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]

669 [40 CFR 61.68(c)] Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

670 [40 CFR 61.68(d)] Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)] Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]

671 [40 CFR 61.68(g)] Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.

672 [40 CFR 61.68] Which Months: All Year Statistical Basis: None specified Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)] Vents shall be routed to the VCM Recovery Units, EQT096 and EQT097 or to the thermal oxidizers, TRT001 and TRT002 - Determined as MACT.

EQT0094 P-GH2 - Gas Holder No. 2

673 [40 CFR 61.68] 674 [40 CFR 61.71(a)] 675 [LAC 33:III.5|09.A]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0094 P-GH2 - Gas Holder No. 2

676 [40 CFR 61.64(d)]

Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.65(a). Subpart F. [40 CFR 61.64(d)].
 Which Months: All Year Statistical Basis: Three-hour average
 Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

677 [40 CFR 61.67(a)(2)]

Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]

678 [40 CFR 61.67(b)]

Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]

679 [40 CFR 61.67(e)]

Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]

680 [40 CFR 61.67(f)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

681 [40 CFR 61.68(c)]

Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

682 [40 CFR 61.68(d)]

Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]

683 [40 CFR 61.68(f)]

Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.

684 [40 CFR 61.68]

Which Months: All Year Statistical Basis: None specified

685 [40 CFR 61.71(a)]

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]

686 [LAC 33:III.5109.A]

Vents shall be routed to the VCM Recovery Units, EQT096 and EQT097 or to the thermal oxidizers, TRT001 and TRT002 - Determined as MACT.

EQT0095 P-KOT - Knockout Tank

687 [40 CFR 61.64(d)]

Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.65(a). Subpart F. [40 CFR 61.64(d)].

Which Months: All Year Statistical Basis: Three-hour average
 Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0095 P-KOT - Knockout Tank

- Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
- Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
- Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the sources, the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
- Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.
- Which Months: All Year Statistical Basis: None specified
- Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a) through (s)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)] Venis shall be routed to the VCM Recovery Units, EQT096 and EQT097 or to the thermal oxidizers, TRT001 and TRT002 - Determined as MACT.
- EQT0096 P-RU1 - VCM Recovery Unit No. 1**
- 698 [40 CFR 61.64(d)] Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.65(a). Subpart F. [40 CFR 61.64(d)]
- 699 [40 CFR 61.67(a)(2)] Which Months: All Year Statistical Basis: Three-hour average Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
- 700 [40 CFR 61.67(b)] Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- 701 [40 CFR 61.67(c)] Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER2008001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0096 P-RU1 - VCM Recovery Unit No. 1

Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F.

702 [40 CFR 61.67(f)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

703 [40 CFR 61.68(c)]
 Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

704 [40 CFR 61.68(d)]
 Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F [40 CFR 61.68(f)]

705 [40 CFR 61.68(f)]
 Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.

706 [40 CFR 61.68] Which Months: All Year Statistical Basis: None specified

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]

707 [40 CFR 61.71(a)]

Vents shall be recycled to the process or to the thermal oxidizers, TRT001 and TRT002 - Determined as MACT.

EQT0097 P-RU2 - VCM Recovery Unit No. 2

Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.65(a). Subpart F. [40 CFR 61.64(d)]
 Which Months: All Year Statistical Basis: Three-hour average
 Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

708 [LAC 33:III.5109.A]
 Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]

709 [40 CFR 61.64(d)]
 Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
 Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]

710 [40 CFR 61.67(a)(2)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

711 [40 CFR 61.67(b)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

712 [40 CFR 61.67(e)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

713 [40 CFR 61.67(f)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

714 [40 CFR 61.68(c)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0097 P-RU2 - VCM Recovery Unit No. 2

715 [40 CFR 61.68(d)]

Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]

716 [40 CFR 61.68(f)]

Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.

717 [40 CFR 61.68(f)]

Which Months: All Year Statistical Basis: None specified

718 [40 CFR 61.71(a)]

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]

719 [LAC 33.III.S109.A]

EQT0098 P-C - Centrifuges

720 [40 CFR 61.64(e)(1)(ii)]

Weighed average residual concentration: Vinyl chloride <= 2000 ppm in PVC dispersion resins, excluding latex resins, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]

Which Months: All Year Statistical Basis: None specified

721 [40 CFR 61.64(e)(1)(ii)]

Weighed average residual concentration: Vinyl chloride <= 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]

Which Months: All Year Statistical Basis: None specified

722 [40 CFR 61.65(b)(9)(ii)]

Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride <= 10 ppm before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(ii)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

723 [40 CFR 61.65(b)(9)(ii)]

Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]

724 [40 CFR 61.67(a)(2)]

725 [40 CFR 61.67(b)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER2008001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0098 P-C - Centrifuges

- 726 [40 CFR 61.67(e)]
 Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- 727 [40 CFR 61.67(f)]
 Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- 728 [40 CFR 61.68(c)]
 Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
- 729 [40 CFR 61.68(d)]
 Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
- 730 [40 CFR 61.68(f)]
 Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
- Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]
- 732 [LAC 33:III.S109.A]
 Shall comply with 40 CFR 61 Subpart F - Determined as MACT.

EQT0099 P.D - Dryers

- 733 [40 CFR 61.64(e)(i)]
 Weighed average residual concentration: Vinyl chloride \leq 2000 ppm in PVC dispersion resins, excluding latex resins, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(i)(ii)]
- Which Months: All Year Statistical Basis: None specified
- 734 [40 CFR 61.64(e)(ii)]
 Weighed average residual concentration: Vinyl chloride \leq 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(i)(iii)]
- Which Months: All Year Statistical Basis: None specified
- 735 [40 CFR 61.65(b)(9)(i)]
 Inprocess wastewater (vinyl chloride $>$ 10 ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
- Which Months: All Year Statistical Basis: None specified
- 736 [40 CFR 61.65(b)(9)(ii)]
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
- 737 [40 CFR 61.67(a)(2)]
 Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
- 738 [40 CFR 61.67(b)]
 Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0099 P-D - Dryers

Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]

Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limit, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]

Shall comply with 40 CFR 61. Subpart F - Determined as MACT.

EQT1000 P-S - Separators

Weighted average residual concentration: Vinyl chloride ≤ 2000 ppm in PVC dispersion resins, excluding latex resins, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(i)]

Which Months: All Year Statistical Basis: None specified

Weighted average residual concentration: Vinyl chloride ≤ 400 ppm in all PVC resins except dispersion resins, including latex resins, averaged separately for each type of resin, measured immediately after the stripping operation is completed. Subpart F. [40 CFR 61.64(e)(1)(ii)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater (vinyl chloride > 10 ppm): Vinyl chloride ≤ 10 ppm before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]

Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0100 P-S - Separators

- 752 [40 CFR 61.67(e)] Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- 753 [40 CFR 61.67(f)] Performance Test Data recordkeeping by electronic or hard copy as needed: Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- 754 [40 CFR 61.68(e)] Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
- 755 [40 CFR 61.68(d)] Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
- 756 [40 CFR 61.68(f)] Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
- 757 [40 CFR 61.71(a)] Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]
- 758 [LAC 33:III.S109.A] Shall comply with 40 CFR 61 Subpart F - Determined as MACT.

EQT0101 P-WWT - Wastewater Tank

- 759 [40 CFR 60.112b(a)(3)(ii)] VOC, Total $\geq 95\%$ reduction efficiency using a closed vent system and control device. Subpart Kb. [40 CFR 60.112b(a)(3)(ii)]
- 760 [40 CFR 60.112b(a)(3)] Which Months: All Year Statistical Basis: None specified
- 761 [40 CFR 60.112b(b)(1)] Equip with a closed vent system and control device. Design the closed vent system to collect all VOC vapors and gases discharged from the storage vessel and operate with no detectable emissions. Subpart Kb. [40 CFR 60.112b(a)(3)]
- 762 [40 CFR 60.116b(b)] Equip with a closed vent system and control device as specified in 40 CFR 60.112b(a)(3). Subpart Kb. [40 CFR 60.112b(b)(1)]
- 763 [40 CFR 61.65(b)(9)(i)] Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep readily accessible records showing the dimension of the storage vessel and an analysis showing the capacity of the storage vessel. Keep copies of all records for the life of the source as specified by 40 CFR 60.116b(a). Subpart Kb. [40 CFR 60.116b(b)]
- 764 [40 CFR 61.65(b)(9)(ii)] Inprocess wastewater (vinyl chloride $> 10\text{ ppm}$): Vinyl chloride $\leq 10\text{ ppm}$ before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride, before being exposed to the atmosphere; before being discharged to a wastewater treatment process, or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(ii)]
- Which Months: All Year Statistical Basis: None specified
- Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0101 P-WWT - Wastewater Tank

765 [LAC 33:III.2153.B]

Wastewater - VOC, Total \geq 90 % control efficiency.

Which Months: All Year Statistical Basis: Three one-hour test average

Wastewater stream - VOC, Total \leq 1000 ppmw.

Which Months: All Year Statistical Basis: Three one-hour test average

Vents shall be routed to the Recovery Units (EQT096 or EQT097) or the Thermal Oxidizers (TRT001, TRT002) - Determined as MACT.

EQT0102 P-WWS - Wastewater Stripper

768 [40 CFR 61.65(b)(9)(i)]

Inprocess wastewater (vinyl chloride $>$ 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.66]

Wastewater - VOC, Total \geq 90 % control efficiency.

Which Months: All Year Statistical Basis: Three one-hour test average

Wastewater stream - VOC, Total \leq 1000 ppmw.

Which Months: All Year Statistical Basis: Three one-hour test average

Vents shall be routed to the Gas Holder No. 2 (EQT094) or the Thermal Oxidizers (TRT001, TRT002) - Determined as MACT.

EQT0103 PVCWW-1 - Centrifuge Wastewater Discharge

773 [40 CFR 61.65(b)(9)(i)]

Inprocess wastewater (vinyl chloride $>$ 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.66]

Wastewater - VOC, Total \geq 90 % control efficiency.

Which Months: All Year Statistical Basis: Three one-hour test average

Wastewater stream - VOC, Total \leq 1000 ppmw.

Which Months: All Year Statistical Basis: Three one-hour test average

Conduct emissions tests to determine VCM concentration in discharged wastewater: Due annually. The test's purpose is to demonstrate compliance with the limits of this permit. Test methods and procedures shall be in accordance with 40 CFR 61.67(b)(3).

Submit notification: Due at least 30 days prior to performance/emissions test to the Office of Environmental Assessment, Environmental Technology Division, Engineering Services, to provide the opportunity to conduct a pretest meeting and observe the emission testing.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0103 PVCWW-1 - Centrifuge Wastewater Discharge

779 [LAC 33:III.507.H.1.a] Submit report: Due within 60 days after performance/emissions test. Submit emissions test results to the Office of Environmental Assessment, Environmental Technology Division, Engineering Services.
 The wastewater shall be routed to the biological treatment unit, FUG005 - Determined as MACT.

EQT0104 PVCWW-2 - Wastewater Stripper Discharge

Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride ≤ 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
 Which Months: All Year Statistical Basis: None specified
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
 Wastewater - VOC, Total $\geq 90\%$ control efficiency.
 Which Months: All Year Statistical Basis: Three one-hour test average
 Wastewater stream - VOC, Total ≤ 1000 ppmw.
 Which Months: All Year Statistical Basis: Three one-hour test average
 Conduct emissions tests to determine VCM concentration in discharged wastewater: Due annually. The test's purpose is to demonstrate compliance with the limits of this permit. Test methods and procedures shall be in accordance with 40 CFR 61.67(g)(3).
 Submit notification: Due at least 30 days prior to performance/emissions test to the Office of Environmental Assessment, Environmental Technology Division, Engineering Services, to provide the opportunity to conduct a pretest meeting and observe the emission testing.
 Submit report: Due within 60 days after performance/emissions test. Submit emissions test results to the Office of Environmental Assessment, Environmental Technology Division, Engineering Services.
 The wastewater shall be routed to the biological treatment unit, FUG005 - Determined as MACT.

EQT0105 PVCWW-3 - Scrubber 1 Wastewater Discharge

Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride ≤ 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
 Which Months: All Year Statistical Basis: None specified
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
 Wastewater - VOC, Total $\geq 90\%$ control efficiency.
 Which Months: All Year Statistical Basis: Three one-hour test average
 Wastewater stream - VOC, Total ≤ 1000 ppmw.
 Which Months: All Year Statistical Basis: Three one-hour test average

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0105 PVCWW-3 - Scrubber 1 Wastewater Discharge

793 [LAC 33:III.5109.A] The wastewater shall be routed to the biological treatment unit, FUG005 - Determined as MACT.

EQT0106 PVCWW-4 - Scrubber 2 Wastewater Discharge

794 [40 CFR 61.65(b)(9)(ii)] Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride <= 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(ii)]

795 [40 CFR 61.65(b)(9)(ii)] Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

796 [LAC 33:III.2153.B] Wastewater - VOC, Total >= 90 % control efficiency.

797 [LAC 33:III.2153.B] Which Months: All Year Statistical Basis: Three one-hour test average

798 [LAC 33:III.5109.A] Wastewater stream - VOC, Total <= 1000 ppmw.

Which Months: All Year Statistical Basis: Three one-hour test average

The wastewater shall be routed to the biological treatment unit, FUG005 - Determined as MACT.

EQT0107 PVCWW-2a - Gas Holder 1 Wastewater Discharge

799 [40 CFR 61.65(b)(9)(ii)] Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride <= 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(ii)]

800 [40 CFR 61.65(b)(9)(ii)] Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

801 [LAC 33:III.5109.A] The wastewater shall be routed to the wastewater stripper, EQT102 - Determined as MACT.

EQT0108 PVCWW-2b - Knock-Out Tank Wastewater Discharge

802 [40 CFR 61.65(b)(9)(ii)] Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride <= 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(ii)]

803 [40 CFR 61.65(b)(9)(ii)] Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

804 [LAC 33:III.5109.A] The wastewater shall be routed to the wastewater stripper, EQT102 - Determined as MACT.

SPECIFIC REQUIREMENTS**AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant****Activity Number: PER200080001****Permit Number: 1280-00118-V1****Air - Title V Regular Permit Minor Mod****EQT0109 PVCWW-2c - VCM Recovery Wastewater Discharge**

Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

The wastewater shall be routed to the wastewater stripper, EQT102 - Determined as MACT.

EQT0110 PVCWW-2d - Gas Holder 2 Wastewater Discharge

Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

The wastewater shall be routed to the wastewater stripper, EQT102 - Determined as MACT.

EQT0111 PVCWW-2e - Slurry Stripper Wastewater Discharge

Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

The wastewater shall be routed to the wastewater stripper, EQT102 - Determined as MACT.

EQT0167 U-7A - South Tank Yard Fire Water Pump

Comply with the emission standards in Table 4. Subpart III. [40 CFR 60.4205(c)]

Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.

Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0167 U-7A - South Tank Yard Fire Water Pump

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine.

Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)] Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)] Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under §60.4205 but not §60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0168 U-8A - North Tank Yard Fire Water Pump

Comply with the emission standards in Table 4. Subpart III. [40 CFR 60.4205(c)]

Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.

Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

817 [40 CFR 60.4209(a)]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine.

Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

818 [40 CFR 60.4211(e)]

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)] Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]

819 [40 CFR 60.4211(b)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are

820 [40 CFR 60.4211(e)]

recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under §60.4205 but not §60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

824 [LAC 33:III.1101.B]

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

825 [40 CFR 60.4205(c)]

Comply with the emission standards in Table 4. Subpart III. [40 CFR 60.4205(c)]

Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.

Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]

826 [40 CFR 60.4206]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]

827 [40 CFR 60.4207(a)]

Which Months: All Year Statistical Basis: None specified

828 [40 CFR 60.4209(a)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0168 U-8A - North Tank Yard Fire Water Pump

829 [40 CFR 60.4211(a)]

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)] Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]

830 [40 CFR 60.4211(b)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine.

Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 60.4205 but not 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1.7.

EQT0169 U-9 - Ship Dock Emergency Pump

836 [40 CFR 60.4205(c)]

Comply with the emission standards in Table 4. Subpart III. [40 CFR 60.4205(c)] Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.

Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

EQT0169 U-9 - Ship Dock Emergency Pump

- 841 [40 CFR 60.4211(b)]
 842 [40 CFR 60.4211(e)]

Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]
 Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under §60.4205 but not §60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.
 Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified
 Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0170 U-10 - Utility Emergency Generator

- 847 [40 CFR 60.4205(a)]
 848 [40 CFR 60.4206]
 849 [40 CFR 60.4207(a)]
 850 [40 CFR 60.4209(a)]

Comply with the emission standards in 40 CFR 60 Subpart III Table 1. Subpart III. [40 CFR 60.4205(a)]
 Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.
 Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]
 Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]
 Which Months: All Year Statistical Basis: None specified
 Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)]
 Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0170 U-10 - Utility Emergency Generator

853 [40 CFR 60.4211(c)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine.

Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 60.4205 but not 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

Submit all of the applicable notifications in 40 CFR 63.7(b) and (c), 63.8(e), (f)(4) and (f)(6), and 63.9(b) through (e), (g), and (h) by the dates specified, as specified in 40 CFR 63.6645(b) through (f). Subpart ZZZZ.

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0171 C-6A - C/A Emergency Generator

859 [40 CFR 60.4205(a)]

Comply with the emission standards in 40 CFR 60 Subpart III Table 1. Subpart III. [40 CFR 60.4205(a)]

Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.

Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)] Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]

860 [40 CFR 60.4206]

861 [40 CFR 60.4207(a)]

862 [40 CFR 60.4209(a)]

863 [40 CFR 60.4211(a)]

864 [40 CFR 60.4211(b)].

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0171 C-6A - C/A Emergency Generator

865 [40 CFR 60.4211(e)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 60.4205 but not 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

Submit all of the applicable notifications in 40 CFR 63.7(b) and (c), 63.8(e), (f)(4) and (f)(6), and 63.9(b) through (e), (g), and (h) by the dates specified, as specified in 40 CFR 63.6645(b) through (f). Subpart ZZZZ.

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified
 Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0172 M-14 - VCM Equipment Opening for Turnaround

871 [LAC 33:III.5109.A.1] Compliance with NESHAP 40 CFR 61 Subpart F has been determined to be compliance with MACT in accordance with LAC 33:III.5109.A.2.

EQT0173 M-15 - VCM Equipment Opening for Maintenance

872 [LAC 33:III.5109.A.1] Compliance with NESHAP 40 CFR 61 Subpart F has been determined to be compliance with MACT in accordance with LAC 33:III.5109.A.2.

EQT0174 M-16A - VCM Unit Emergency Generator

873 [40 CFR 60.4205(a)]

Comply with the emission standards in 40 CFR 60 Subpart III Table 1. Subpart III. [40 CFR 60.4205(a)]
 Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.
 Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Piaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0174 M-16A - VCM Unit Emergency Generator

- Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine.
- Subpart III. [40 CFR 60.4209(a)]
 Which Months: All Year Statistical Basis: None Specified
 Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)]
 Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]
 Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine.
 Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under §60.4205 but not §60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.
- [40 CFR 60.4211(e)]
 If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.
 Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]
 Submit all of the applicable notifications in 40 CFR 63.7(b) and (c), 63.8(e), (f)(4) and (f)(6), and 63.9(b) through (e), (g), and (h) by the dates specified, as specified in 40 CFR 63.6645(b) through (f). Subpart ZZZZ.
- Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- Which Months: All Year Statistical Basis: None Specified
 Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0175 P-25 - IB Loading Hopper

- Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- Which Months: All Year Statistical Basis: Six-minute average

EQT0176 P-26 - IC Loading Hopper

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0176 P-26 -IC Loading Hopper

886 [LAC 33:III.1311.C]

Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average

EQT0177 P-27 - IFS Loading Hopper

887 [LAC 33:III.1311.C]

Opacity <= 20 percent; except emissions may have an average opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: Six-minute average

EQT0178 P-28A - PVC Emergency Combustion Equipment

888 [40 CFR 60.4205(a)]

Comply with the emission standards in 40 CFR 60 Subpart III Table 1. Subpart III. [40 CFR 60.4205(a)] Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III. Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)] Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under §60.4205 but not §60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

If required by 40 CFR 60.4212(a) through (d). Subpart III.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0178 P-28A - PVC Emergency Combustion Equipment

897 [40 CFR 63.6645]

898 [LAC 33:III.1101.B]

899 [LAC 33:III.1305]
899 [LAC 33:III.1305]

Submit all of the applicable notifications in 40 CFR 63.7(b) and (c), 63.8(e), (f)(4) and (f)(6), and 63.9(b) through (e), (g), and (h) by the dates specified, as specified in 40 CFR 63.6645(b) through (j). Subpart ZZZZ.

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire; soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0179 MCL-633 - Acid Recovery Wastewater Stripper 1

900 [40 CFR 61.65(b)(9)(ii)]

Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride <= 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)].

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)].

Determine whether each wastewater stream requires control for Table 8 compounds by complying with the requirements in either 40 CFR 63.132(b)(1)(i) or (b)(1)(ii), and (b)(1)(iii). Subpart G. [40 CFR 63.132(b)(1)].

Determine whether each wastewater stream requires control for Table 9 compounds by complying with the requirements in 40 CFR 63.132(b)(2)(i) or (b)(2)(ii), and (b)(2)(iii). Subpart G. [40 CFR 63.132(b)(2)].

Determine total annual average concentration of Table 9 compounds according to the procedures in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 9 compounds. Subpart G. [40 CFR 63.132(c)].

Determine annual average flow rate according to the procedures specified in 40 CFR 63.144(b), and determine whether a wastewater stream is Group 1 or Group 2 for Table 8 compounds. Subpart G. [40 CFR 63.132(d)].

Do not discard liquid or solid organic materials with a concentration of greater than 10,000 ppm of Table 9 compounds (as determined by analysis of the stream composition, engineering calculations, or process knowledge, according to the provisions of 40 CFR 63.144(b)) from a chemical manufacturing process unit to water or wastewater, unless the receiving stream is managed and treated as a Group 1 wastewater stream. Subpart G. [40 CFR 63.132(f)].

Operate and maintain a steam stripper that meets the requirements of 40 CFR 63.138(d)(1) through (d)(6). Subpart G. [40 CFR 63.138(d)]. Demonstrate compliance with 40 CFR 63.138(b)(1), (c)(1), (e), (f), and/or (g) using the procedures in either 40 CFR 63.138(j)(1) or (j)(2), except as specified in 40 CFR 63.138(j)(3) or (h). Subpart G. [40 CFR 63.138(j)].

Residuals: Return the wastewater stream residual to the treatment process. Subpart G. [40 CFR 63.138(k)(2)]. Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records specified in 40 CFR 63.147(a) through (f), as applicable. Subpart G.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0179 MCL-633 - Acid Recovery Wastewater Stripper 1

- 911 [40 CFR 63.149(a)] Comply with the provisions of 40 CFR 63 Subpart G Table 35 for each item of equipment meeting all the criteria specified in 40 CFR 63.149(b) through (g) and either (e)(1) or (e)(2). Subpart G. [40 CFR 63.149(a)]
 Equipment/operational data recordkeeping by electronic or hard copy as needed. Maintain records to demonstrate that the criteria are being met for any exemption claimed. Maintain records on the premises for at least two years and make such information available to representatives of the Louisiana Department of Environmental Quality and the Environmental Protection Agency upon request.
 Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0180 MCL-634 - Acid Recovery Wastewater Stripper 2

- Inprocess wastewater (vinyl chloride > 10ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
 Which Months: All Year Statistical Basis: None specified
 Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
 Determine whether each wastewater stream requires control for Table 8 compounds by complying with the requirements in either 40 CFR 63.132(b)(1)(i) or (b)(1)(ii), and (b)(1)(iii). Subpart G. [40 CFR 63.132(b)(1)]
 Determine whether each wastewater stream requires control for Table 9 compounds by complying with the requirements in 40 CFR 63.132(b)(2)(i) or (b)(2)(ii), and (b)(2)(iii). Subpart G. [40 CFR 63.132(b)(2)]
 Determine total annual average concentration of Table 9 compounds according to the procedures in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 9 compounds. Subpart G. [40 CFR 63.132(c)]
 Determine annual average concentration for each Table 8 compound according to the procedures specified in 40 CFR 63.144(b), and determine annual average flow rate according to the procedures specified in 40 CFR 63.144(c), to determine whether a wastewater stream is Group 1 or Group 2 for Table 8 compounds. Subpart G. [40 CFR 63.132(d)]
 Do not discard liquid or solid organic materials with a concentration of greater than 10,000 ppm of Table 9 compounds (as determined by analysis of the stream composition, engineering calculations, or process knowledge, according to the provisions of 40 CFR 63.144(b)) from a chemical manufacturing process unit to water or wastewater, unless the receiving stream is managed and treated as a Group 1 wastewater stream. Subpart G. [40 CFR 63.132(f)]
 Operate and maintain a steam stripper that meets the requirements of 40 CFR 63.138(d)(1) through (d)(6). Subpart G. [40 CFR 63.138(d)]
 Demonstrate compliance with 40 CFR 63.138(b)(1), (c)(1), (c)(2), and/or (g) using the procedures in either 40 CFR 63.138(j)(1) or (j)(2), except as specified in 40 CFR 63.138(j)(3) or (h). Subpart G. [40 CFR 63.138(j)]
 Residuals: Return the wastewater stream residual to the treatment process. Subpart G. [40 CFR 63.138(k)(2)]
 Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records specified in 40 CFR 63.147(a) through (f), as applicable. Subpart G.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0180 MCL-634 - Acid Recovery Wastewater Stripper 2

Comply with the provisions of 40 CFR 63 Subpart G Table 35 for each item of equipment meeting all the criteria specified in 40 CFR 63.149(b) through (d) and either (e)(1) or (e)(2). Subpart G. [40 CFR 63.149(a)] Equipment/operational data recordkeeping by electronic or hard copy as needed. Maintain records to demonstrate that the criteria are being met for any exemption claimed. Maintain records on the premises for at least two years and make such information available to representatives of the Louisiana Department of Environmental Quality and the Environmental Protection Agency upon request.

Shall comply with 40 CFR 63 Subparts F and G - Determined as MACT.

EQT0181 MTK-501 - Waste Feed Tank

Cover: Ensure that the cover and all openings are designed to operate with no detectable emissions as indicated by an instrument reading of less than 500 ppmv above background, initially and thereafter at least once per year by the methods specified in 40 CFR 61.355(h). Subpart FF. [40 CFR 61.345(a)(1)(i)]

Cover: Maintain each opening in a closed, sealed position at all times that waste is in the container except when it is necessary to use the opening for waste loading, removal, inspection, or sampling, except as specified in 40 CFR 61.345(a)(4). Subpart FF. [40 CFR 61.345(a)(1)(ii)] Install, operate, and maintain a cover on each container used to handle, transfer, or store waste. Subpart FF. [40 CFR 61.345(a)(1)] When waste is transferred into a container by pumping, perform the transfer using a submerged fill pipe. Ensure that the submerged fill pipe outlet extends to within two fill pipe diameters of the bottom of the container while the container is being loaded. Ensure that the cover remains in place during loading of the waste and maintain all openings in a closed, sealed position except for those openings required for the submerged fill pipe, those openings required for venting of the container to prevent physical damage or permanent deformation of the container or cover, any opening complying with 40 CFR 61.345(a)(4). Subpart FF. [40 CFR 61.345(a)(2)] Perform treatment of a waste in a container in a manner such that while the waste is being treated the container meets the standards specified in 40 CFR 61.345(a)(3)(i) through (a)(3)(iii), except as specified in 40 CFR 61.345(a)(4). Subpart FF. [40 CFR 61.345(a)(3)]

Cover: Equipment/operational data monitored by visual inspection/determination once initially and once every quarter thereafter to ensure that the cover and all openings are closed and gasketed properly. Subpart FF. [40 CFR 61.345(b)] Which Months: All Year Statistical Basis: None specified Make first efforts at repair as soon as practicable, but not later than 15 calendar days after a broken seal or gasket or other problem is identified, except as provided in 40 CFR 61.350. Subpart FF. [40 CFR 61.345(c)] Determine compliance with 40 CFR 61 Subpart FF using the test methods and procedures specified in 40 CFR 61.355(a) through (l), as applicable. Subpart FF.

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Maintain records as specified in 40 CFR 61.356(a) through (n), as applicable. Maintain each record in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. Subpart FF. Comply with the requirements of 40 CFR 63 Subparts G and H. Subpart F. [40 CFR 63.102(a)] Conduct performance tests and compliance determinations according to the schedule and procedures in 40 CFR 63.7(a) and the applicable sections of 40 CFR 63 Subparts G and H. Subpart F. [40 CFR 63.103(b)(1)]

Submit Notification: Due at least 30 calendar days before a performance test is scheduled. Notify DEQ of the intention to conduct a performance test to allow DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 63.103(b)(2)]

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|------------------------------|-------------------------------|---------------------------|
| 925 [40 CFR 63.149(a)] | 926 [LAC 33:III.2115.K] | 927 [LAC 33:III.5109.A] |
| 928 [40 CFR 61.345(a)(1)(i)] | 929 [40 CFR 61.345(a)(1)(ii)] | 930 [40 CFR 61.345(a)(1)] |
| | 931 [40 CFR 61.345(a)(2)] | 932 [40 CFR 61.345(a)(3)] |
| | | 933 [40 CFR 61.345(b)] |
| | | 934 [40 CFR 61.345(c)] |
| | | 935 [40 CFR 61.355] |
| | | 936 [40 CFR 61.356] |
| | | 937 [40 CFR 63.102(a)] |
| | | 938 [40 CFR 63.103(b)(1)] |
| | | 939 [40 CFR 63.103(b)(2)] |

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0181 MTK-501 - Waste Feed Tank

- 940 [40 CFR 63.103(b)(3)] Conduct performance tests according to the provisions in 40 CFR 63.7(e) of subpart A, except conduct performance tests at maximum representative operating conditions for the process. Subpart F. [40 CFR 63.103(b)(3)]
- 941 [40 CFR 63.103(c)(1)] Maintain all applicable records in such a manner that they can be readily accessed. Retain the most recent 6 months of records on site or make accessible by computer or other means that provides access within 2 hours after a request. Subpart F. [40 CFR 63.103(c)(1)]
- 942 [40 CFR 63.103(c)(2)] Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. Maintain records specified in 40 CFR 63.103(c)(2)(i) through (iii), as well as records specified in 40 CFR 63 Subparts G and H. Subpart F. [40 CFR 63.103(c)(2)]
- 943 [40 CFR 63.103(c)] Keep copies of all applicable reports and records required by 40 CFR 63 Subparts F, G, and H for at least 5 years. If 40 CFR 63 Subparts G or H require records to be maintained for a time period different than 5 years, maintain those records for the time specified in 40 CFR 63 Subparts G or H. Subpart F. [40 CFR 63.103(c)]
- 944 [40 CFR 63.119(a)(1)] Reduce hazardous air pollutants emissions to the atmosphere either by operating and maintaining a fixed roof and internal floating roof, an external floating roof, an external floating roof converted to an internal floating roof, a closed-vent system and control device, routing the emissions to a process or a fuel gas system, or vapor balancing in accordance with the requirements in 40 CFR 63.119(b), (c), (d), (e), (f), or (g) or equivalent as provided in 40 CFR 63.121. Subpart G. [40 CFR 63.119(a)(1)]
- 945 [40 CFR 63.120(a)(1)] Tank roof and seals monitored by visual inspection/determination at the regulation's specified frequency. Inspect the internal floating roof, the primary seal, and the secondary seal (if one is in service) according to the schedule specified in 40 CFR 63.120(a)(2) and (a)(3). Subpart G. [40 CFR 63.120(a)(1)]
- Which Months: All Year Statistical Basis: None specified
- 946 [40 CFR 63.120(a)(4)] Repair storage vessel or empty and remove from service within 45 calendar days, if during the inspections required by 40 CFR 63.120(a)(2)(i) or (a)(3)(ii), any of the conditions specified in 40 CFR 63.120(a)(4) are found. Subpart G. [40 CFR 63.120(a)(4)]
- 947 [40 CFR 63.120(a)(7)] If any of the conditions listed in 40 CFR 63.120(a)(7) are found during the inspections required by 40 CFR 63.120(a)(2)(ii), (a)(3)(i), or (a)(3)(iii), repair the storage vessel as necessary so that none of the conditions specified exist before filling or refilling the storage vessel with organic HAP. Subpart G. [40 CFR 63.120(a)(7)]
- 948 [40 CFR 63.120(a)] Submit Notification: Due in writing at least 30 calendar days prior to the refilling of each storage vessel to afford DEQ the opportunity to have an observer present, for all the inspections required by 40 CFR 63.120(a)(2)(ii), (a)(3)(i), and (a)(3)(ii). If the inspection required by 40 CFR 63.120(a)(2)(ii), (a)(3)(i), or (a)(3)(ii) is not planned and it could not have been known about 30 calendar days in advance of refilling, submit notification at least 7 calendar days prior to the refilling. Notification can be made by telephone and immediately followed by written documentation demonstrating why the inspection was unplanned. Subpart G. [40 CFR 63.120(a)]
- 949 [40 CFR 63.122(a)(1)] Submit an Initial Notification as required by 40 CFR 63.15(b). Subpart G. [40 CFR 63.122(a)(1)]
- 950 [40 CFR 63.122(a)(3)] Submit a Notification of Compliance Status as required by 40 CFR 63.152(b). Include the information specified in 40 CFR 63.122(c). Subpart G. [40 CFR 63.122(a)(3)]
- 951 [40 CFR 63.122(a)(4)] Submit Periodic Reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(d), (e), (f), and (g). Subpart G. [40 CFR 63.122(a)(4)]
- 952 [40 CFR 63.122(a)(5)] Submit, as applicable, other reports as required by 40 CFR 63.152(d). Include the information specified in 40 CFR 63.122(h). Subpart G. [40 CFR 63.122(a)(5)]
- 953 [40 CFR 63.123] Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep readily accessible records of the information specified in 40 CFR 63.123(a) through (i), as applicable. Keep the records as long as the storage vessel retains Group 1 status and is in operation. Subpart G.

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER2008001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0181 MTK-501 - Waste Feed Tank

954 [LAC 33:III.2103.A]
 Equip with a submerged fill pipe.
 VOC, Total \geq 95 % control efficiency using a vapor loss control system. This limitation does not apply during periods of planned routine maintenance which may not exceed 240 hours per year.

Which Months: All Year Statistical Basis: None specified

Determine VOC maximum true vapor pressure using the methods in LAC 33:III.2103.H.3.a-e.

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records of the information specified in LAC 33:III.2103.I.1 - 7, as applicable.

EQT0186 U-7B - South Tank Yard Fire Water Pump

958 [40 CFR 60.4205(c)]
 Comply with the emission standards in Table 4. Subpart III. [40 CFR 60.4205(c)]
 Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator

that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.
 Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine.
 Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)]
 Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine.

Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 60.4205 but not 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.
 [40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.
 Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards

applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

965 [40 CFR 60.4212]

966 [40 CFR 60.4214(b)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0186 U-7B - South Tank Yard Fire Water Pump

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified
 Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0187 U-7C - South Tank Yard Fire Water Pump

Comply with the emission standards in Table 4. Subpart III. [40 CFR 60.4205(c)]

Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart IIII.
 Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart IIII. [40 CFR 60.4207(a)]
 Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine.
 Subpart III. [40 CFR 60.4209(a)]
 Which Months: All Year Statistical Basis: None specified
 Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart IIII. [40 CFR 60.4211(a)]
 Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart IIII. [40 CFR 60.4211(b)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 60.4205 but not 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.
 [40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart IIII.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart IIII. [40 CFR 60.4214(b)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0187 U-7C - South Tank Yard Fire Water Pump

978 [LAC 33.III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

979 [LAC 33.III.1305]

Which Months: All Year Statistical Basis: None specified
 Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33.III.1305.A.1-7.

EQT0188 U-8B - North Tank Yard Fire Water Pump

980 [40 CFR 60.4205(c)]

981 [40 CFR 60.4206]

Comply with the emission standards in Table 4. Subpart III. [40 CFR 60.4205(c)]
 Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator, that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.

982 [40 CFR 60.4207(a)]

Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]
 Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine.

983 [40 CFR 60.4209(a)]

Subpart III. [40 CFR 60.4209(a)]
 Which Months: All Year Statistical Basis: None specified

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)]
 Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 60.4205 but not 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

984 [40 CFR 60.4211(e)]

[40 CFR 60.4211(e)]
 If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III.

985 [40 CFR 60.4211(b)]

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

986 [40 CFR 60.4211(e)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0188 U-8B - North Tank Yard Fire Water Pump

989 [LAC 33.III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33.III.1305.A.1-7.

EQT0189 U-8C - North Tank Yard Fire Water Pump

991 [40 CFR 60.4205(c)]

992 [40 CFR 60.4206]

Comply with the emission standards in Table 4. Subpart IIII. [40 CFR 60.4205(c)] Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart IIII.

Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart IIII. [40 CFR 60.4207(a)]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart IIII. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart IIII. [40 CFR 60.4211(a)] Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart IIII. [40 CFR 60.4211(b)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under §60.4205 but not §60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart IIII.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart IIII. [40 CFR 60.4214(b)]

998 [40 CFR 60.4212]
 999 [40 CFR 60.4214(b)]

SPECIFIC REQUIREMENTS**AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant**

Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

EQT0189 U-8C - North Tank Yard Fire Water Pump

1000 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0190 C-6B - C/A Emergency Generator

1002 [40 CFR 60.4205(b)]

1003 [40 CFR 60.4206]

1004 [40 CFR 60.4207(a)]

1005 [40 CFR 60.4209(a)]

Comply with the emission standards in 40 CFR 60.4202. Subpart III. [40 CFR 60.4205(b)]

Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III.
 Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)]
 Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified

1006 [40 CFR 60.4211(a)]

1007 [40 CFR 60.4211(c)]

1008 [40 CFR 60.4211(e)]

1009 [40 CFR 60.4214(b)]

1010 [40 CFR 63.6645]

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)]
 Comply with the emission standards specified in 60.4204(b) or 60.4205(b), you must comply by purchasing an engine certified to the emission standards in 60.4204(b), or 60.4205(b) or (c), as applicable, for the same model year and maximum (or in the case of fire pumps, NFPA nameplate) engine power. The engine must be installed and configured according to the manufacturer's specifications. [40 CFR 60.4211(c)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 60.4205 but not 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited. [40 CFR 60.4211(e)]

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]
 Submit all of the applicable notifications in 40 CFR 63.7(b) and (c), 63.8(e), (f)(4) and (f)(6), and 63.9(b) through (e), (g), and (h) by the dates specified, as specified in 40 CFR 63.6645(b) through (f). Subpart ZZZZ.

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0190 C-6B - C/A Emergency Generator

1011 [LAC 33:III.1101.E]
 Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified
 Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0191 M-16B - VCM Unit Emergency Generator

Comply with the emission standards in 40 CFR 60 Subpart IIII Table 1. Subpart IIII. [40 CFR 60.4205(a)]

Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart IIII.

Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart IIII. [40 CFR 60.4207(a)]

Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart IIII. [40 CFR 60.4209(a)]
 Which Months: All Year Statistical Basis: None specified

Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94 and/or 1068, as applicable. Subpart IIII. [40 CFR 60.4211(a)] Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart IIII. [40 CFR 60.4211(b)]

Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 60.4205 but not 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.
 [40 CFR 60.4211(c)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart IIII.

Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart IIII. [40 CFR 60.4214(b)]

1012 [LAC 33:III.1305]
 1013 [40 CFR 60.4205(a)]
 1014 [40 CFR 60.4206]
 1015 [40 CFR 60.4207(a)]
 1016 [40 CFR 60.4209(a)]
 1017 [40 CFR 60.4211(a)]
 1018 [40 CFR 60.4211(b)]
 1019 [40 CFR 60.4211(e)]
 1020 [40 CFR 60.4212]
 1021 [40 CFR 60.4214(b)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0191 M-16B - VCM Unit Emergency Generator

1022 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0192 M-16C - VCM Unit Emergency Generator

1024 [40 CFR 60.4213(d)]

Determine compliance with the percent reduction requirement using the methods and procedures specified in 40 CFR 60.4213(d)(1) through (d)(3). Subpart III. [40 CFR 60.4213(d)]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0193 M-16D - VCM Unit Emergency Generator

1027 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0194 M-16E - VCM Unit Emergency Generator

1029 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0195 P-28B - PVC Emergency Combustion Equipment

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

EQT0195 P-28B - PVC Emergency Combustion Equipment

1031 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0196 P-28C - PVC Emergency Combustion Equipment

1033 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified

Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

EQT0197 P-28D - PVC Emergency Combustion Equipment

1035 [40 CFR 60.4205(a)]

1036 [40 CFR 60.4206]

1037 [40 CFR 60.4207(a)]

1038 [40 CFR 60.4209(a)]

1039 [40 CFR 60.4211(a)]

1040 [40 CFR 60.4211(b)]

1041 [40 CFR 60.4211(c)]

Comply with the emission standards in 40 CFR 60 Subpart III Table 1. Subpart III. [40 CFR 60.4205(a)] Operate and maintain stationary CI ICE according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer, over the entire life of the engine. Subpart III. Beginning October 1, 2007, use diesel fuel that meets the requirements of 40 CFR 80.510(a). Subpart III. [40 CFR 60.4207(a)] Operating time monitored by hour/time monitor continuously during operation. Install a non-resettable hour meter prior to startup of the engine. Subpart III. [40 CFR 60.4209(a)]

Which Months: All Year Statistical Basis: None specified Operate and maintain the stationary CI internal combustion engine and control device according to the manufacturer's written instructions or procedures developed by the owner or operator that are approved by the engine manufacturer. In addition, only change those settings that are permitted by the manufacturer. Also meet the requirements of 40 CFR 89, 94, and/or 1068, as applicable. Subpart III. [40 CFR 60.4211(a)] Demonstrate compliance according to one of the methods specified in 40 CFR 60.4211(b)(1) through (b)(5). Subpart III. [40 CFR 60.4211(b)] Emergency stationary ICE may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State, or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of emergency stationary ICE in emergency situations. Anyone may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. For owners and operators of emergency engines meeting standards under 40 CFR 60.4205 but not 40 CFR 60.4204, any operation other than emergency operation, and maintenance and testing as permitted in this section, is prohibited.

[40 CFR 60.4211(e)]

SPECIFIC REQUIREMENTS**AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant****Activity Number: PER20080001****Permit Number: 1280-00118-V1****Air - Title V Regular Permit Minor Mod****EQT0197 P-28D - PVC Emergency Combustion Equipment**

1042 [40 CFR 60.4212]

1043 [40 CFR 60.4214(b)]

If required by 40 CFR 60.4211(b), conduct performance tests according to 40 CFR 60.4212(a) through (d). Subpart III. Operating time recordkeeping by electronic or hard copy upon occurrence of event. If the emergency engine does not meet the standards applicable to non-emergency engines in the applicable model year, keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. Record the time of operation of the engine and the reason the engine was in operation during that time. Subpart III. [40 CFR 60.4214(b)]

Submit all of the applicable notifications in 40 CFR 63.7(b) and (c), 63.8(e), (f)(4) and (f)(6), and 63.9(b) through (e), (g), and (h) by the dates specified, as specified in 40 CFR 63.6645(b) through (i). Subpart ZZZZ.

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, charging of an incinerator, equipment changes, ash removal or rapping of precipitators, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

Which Months: All Year Statistical Basis: None specified
Prevent particulate matter from becoming airborne by taking all reasonable precautions. These precautions shall include, but not be limited to, those specified in LAC 33:III.1305.A.1-7.

FUG0002 M-12 - VCM Unit Fugitive Emissions

1047 [40 CFR 61.65(b)(8)(i)]

1048 [40 CFR 61.65(b)(8)(ii)]

Operate a reliable and accurate vinyl chloride monitoring system in accordance with the specifications in 40 CFR 61.65(b)(8)(i) for detection of major leaks and identification of the general area of the plant where a leak is located. Subpart F. [40 CFR 61.65(b)(8)(i)]
Implement a formal leak detection and repair program consistent with 40 CFR 61 Subpart V, except as provided in 40 CFR 61.65(b)(8)(iii). Implement this program within 90 days of the effective date of 40 CFR 61 Subpart F. Subpart F. [40 CFR 61.65(b)(8)(ii)]

Inprocess wastewater (vinyl chloride > 10 ppm): Vinyl chloride <= 10 ppm before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

Which Months: All Year Statistical Basis: None specified

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

Identify each piece of equipment in a process unit such that it can be distinguished readily from equipment that is not subject to 40 CFR 63

Subpart H. Subpart H. [40 CFR 63.162(c)]

Clearly identify leaking equipment, for leaking equipment detected as specified in 40 CFR 63.163, 40 CFR 63.164, 40 CFR 63.168, 40 CFR 63.169, and 40 CFR 63.172 through 63.174. The identification may be removed after the equipment is repaired, except for valves or for connectors subject to 40 CFR 63.174(c)(1)(i). The identification on a valve may be removed after it has been monitored as specified in 40 CFR 63.168(f)(3) and 63.175(e)(1)(D), and no leak has been detected during the follow-up monitoring. If electing to comply using the provisions of 40 CFR 63.174(c)(1)(i), the identification on a connector may be removed after it is monitored as specified in 40 CFR 63.174(c)(1)(i) and no leak is detected during that monitoring. Subpart H. [40 CFR 63.162(f)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

FUG0002 M-12 - VCM Unit Fugitive Emissions

- 1053 [40 CFR 63.163(b)(1)] Pumps in light liquid service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 monthly to detect leaks, except as provided in 40 CFR 63.162(b) and 63.163(e) through (j). If a reading of 10,000 ppm (phase I); 5,000 ppm (phase II); or 5,000 ppm (phase III), pumps handling polymerizing monomers, 2,000 ppm (phase II, pumps in food/medical service), or 1,000 ppm (phase III, all other pumps) or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.163(c). Subpart H. [40 CFR 63.163(b)(1)]
- Which Months: All Year Statistical Basis: None specified
- 1054 [40 CFR 63.163(b)(3)] Pumps in light liquid service: Presence of a leak monitored by visual inspection/determination weekly (calendar). Monitor for indications of liquids dripping from the pump seal. If there are indications of liquids dripping from the pump seal, a leak is detected. If a leak is detected, initiate the repair provisions specified in 40 CFR 63.163(c). Subpart H. [40 CFR 63.163(b)(3)]
- Which Months: All Year Statistical Basis: None specified
- 1055 [40 CFR 63.163(c)] Pumps in light liquid service: Make a first attempt at repair no later than 5 calendar days after a leak is detected, and complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.163(c)(3) and 40 CFR 63.171. Subpart H. [40 CFR 63.163(c)]
- 1056 [40 CFR 63.163(d)(2)] Pumps in light liquid service: Implement a quality improvement program for pumps that complies with the requirements of 40 CFR 63.176, if, in Phase III, calculated on a 6-month rolling average, the greater of either 10 percent of the pumps in a process unit or three pumps in a process unit leak. Subpart H. [40 CFR 63.163(d)(2)]
- 1057 [40 CFR 63.163(d)(4)] Pumps in light liquid service: Determine percent leaking pumps using the equation in 40 CFR 63.163(d)(4). Subpart H. [40 CFR 63.163(d)(4)]
- 1058 [40 CFR 63.163(e)(1)] Pumps in light liquid service (dual mechanical seal system): Operate with the barrier fluid at a pressure that is at all times greater than the pump stuffing box pressure, or equip with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed-loop system to a control device that complies with the requirements of 40 CFR 63.172; or equip with a closed-loop system that purges the barrier fluid into a process stream. Subpart H. [40 CFR 63.163(e)(1)]
- 1059 [40 CFR 63.163(e)(2)] Pumps in light liquid service (dual mechanical seal system): Ensure that the barrier fluid is not in light liquid service. Subpart H. [40 CFR 63.163(e)(2)]
- 1060 [40 CFR 63.163(e)(3)] Pumps in light liquid service (dual mechanical seal system): Equip barrier fluid system with a sensor that will detect failure of the seal system, barrier fluid system, or both. Subpart H. [40 CFR 63.163(e)(3)]
- 1061 [40 CFR 63.163(e)(4)] Pumps in light liquid service (dual mechanical seal system): Presence of a leak monitored by visual inspection/determination weekly (calendar).
- 1062 [40 CFR 63.163(e)(6)(i)] Monitor for indications of liquids dripping from the pump seal. If there are indications of liquid dripping from the pump seal at the time of the weekly inspection, monitor the pump as specified in 40 CFR 63.180(b) to determine if there is a leak of organic HAP in the barrier fluid. If an instrument reading of 1,000 ppm or greater is measured, a leak is detected. If a leak is detected, initiate the repair provisions in 40 CFR 63.163(e)(6). Subpart H. [40 CFR 63.163(e)(4)]
- Which Months: All Year Statistical Basis: None specified
- 1063 [40 CFR 63.163(e)(6)(ii)] Pumps in light liquid service (dual mechanical seal system): Determine, based on design considerations and operating experience, criteria that indicates failure of the seal system, the barrier fluid system, or both. Subpart H. [40 CFR 63.163(e)(6)(ii)]
- 1064 [40 CFR 63.163(e)(6)(iii)] Pumps in light liquid service (dual mechanical seal system): Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.163(e)(6)]

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- 1064 [40 CFR 63.163(e)] Pumps in light liquid service (dual mechanical seal system - sensor): Equipment/operational data monitored by visual inspection/determination daily, or equip with an audible alarm unless the pump is located within the boundary of an unmanned plant site. If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criteria established in 40 CFR 63.163(e)(6), a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.163(e)(6). Subpart H. [40 CFR 63.163(e)]
- Which Months: All Year Statistical Basis: None specified
- 1065 [40 CFR 63.163(h)] Pumps in light liquid service (unmanned plant site): Presence of a leak monitored by visual inspection/determination at the regulation's specified frequency. Monitor each pump as often as practicable and at least monthly. Subpart V. [40 CFR 63.163(h)]
- Which Months: All Year Statistical Basis: None specified
- 1066 [40 CFR 63.163(j)(1)] Pumps in light liquid service (unsafe-to-monitor): Determine that the pump is unsafe-to-monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.163(b) through (d). Subpart H. [40 CFR 63.163(j)(1)]
- 1067 [40 CFR 63.163(j)(2)] Pumps in light liquid service (unsafe-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 at the regulation's specified frequency. Maintain a written plan that requires monitoring of the pump as frequently as practicable during safe-to-monitor times but not more frequently than the periodic monitoring schedule otherwise applicable. Subpart H. [40 CFR 63.163(j)(2)]
- Which Months: All Year Statistical Basis: None specified
- 1068 [40 CFR 63.164(a)] Compressors: Equip with a seal system that includes a barrier fluid system and that prevents leakage of process fluid to the atmosphere, except as provided in 40 CFR 63.162(b) and 40 CFR 63.164(h) and (i). Subpart H. [40 CFR 63.164(a)]
- 1069 [40 CFR 63.164(b)] Compressors: Operate the seal system with the barrier fluid at a pressure that is greater than the compressor stuffing box pressure; or equip with a barrier fluid system degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to a control device that complies with the requirements of 40 CFR 63.172; or equip with a closed-loop system that purges the barrier fluid directly into a process stream. Subpart H. [40 CFR 63.164(b)]
- 1070 [40 CFR 63.164(c)] Compressors: Ensure that the barrier fluid is not in light liquid service. Subpart H. [40 CFR 63.164(c)]
- 1071 [40 CFR 63.164(d)] Compressors: Equip each barrier fluid system as described in 40 CFR 63.164(a) through (c) with a sensor that will detect failure of the seal system, barrier fluid system, or both. Subpart H. [40 CFR 63.164(d)]
- 1072 [40 CFR 63.164(e)(2)] Compressors (sensor): Determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both. Subpart H. [40 CFR 63.164(e)(2)]
- 1073 [40 CFR 63.164(g)] Compressors: Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after each leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.164(g)]
- 1074 [40 CFR 63.164(i)(2)] Compressors (no detectable emissions): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once initially and annually, and at other times requested by DEQ. Subpart H. [40 CFR 63.164(i)(2)]
- 1075 [40 CFR 63.164] Compressors (sensor): Equipment/operational data monitored by visual inspection/determination daily, or equip with an alarm, unless the compressor is located within the boundary of an unmanned plant site. If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined under 40 CFR 63.164(e)(2), a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.164(g). Subpart H.
- Which Months: All Year Statistical Basis: None specified
- 1076 [40 CFR 63.165(a)] Pressure relief device in gas/vapor service: Organic HAP < 500 ppm above background except during pressure releases, as determined by the method specified in 63.180(c). Subpart H. [40 CFR 63.165(a)]
- Which Months: All Year Statistical Basis: None specified

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- 1077 [40 CFR 63.165(b)(1)] Pressure relief devices in gas/vapor service: After each pressure release, return to a condition indicated by an instrument reading of less than 500 ppm above background, as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.165(b)(1)]
- Pressure relief devices in gas/vapor service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 within 5 days (calendar) after the pressure release and being returned to organic HAP service, to confirm the condition indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in 40 CFR 63.180(c) Subpart H. [40 CFR 63.165(b)(2)]
- Which Months: All Year Statistical Basis: None specified
- Pressure relief devices in gas/vapor service (rupture disk): After each pressure release, install a new rupture disk upstream of the pressure relief device as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 63.171. Subpart V. [40 CFR 63.165(d)(2)]
- Sampling connection systems: Equip with a closed-purge, closed-loop, or closed-vent system, except as provided in 40 CFR 63.162(b). Operate the system as specified in 40 CFR 63.166(b). Subpart H.
- Open-ended valves or lines: Equip with a cap, blind flange, plug, or a second valve, except as provided in 40 CFR 63.162(b) and 40 CFR 63.167(d) and (e). Ensure that the cap, blind flange, plug or second valve seals the open end at all times except during operations requiring process fluid flow through the open-ended valve or line, or during maintenance or repair. Operate each open-ended valve or line equipped with a second valve in a manner such that the valve on the process fluid end is closed before the second valve is closed. Subpart H.
- Valves in gas/vapor service or light liquid service (Phase III, 2 percent or greater leaking valves): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 monthly, as specified in 40 CFR 63.180(b); or implement a quality improvement program for valves that complies with the requirements of 40 CFR 63.175 and monitor quarterly. If an instrument reading of 500 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.168(f). If electing to implement a quality improvement program, follow the procedures in 40 CFR 63.175. Subpart H. [40 CFR 63.168(d)(1)]
- Which Months: All Year Statistical Basis: None specified
- Valves in gas/vapor service or light liquid service (Phase III, less than 2 percent leaking valves): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 quarterly, as specified in 40 CFR 63.180(b). If an instrument reading of 500 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.168(f). Permittee may elect to comply with the alternate standards in 40 CFR 63.168(d)(3) and (d)(4). Subpart H. [40 CFR 63.168(d)(2)]
- Which Months: All Year Statistical Basis: None specified
- Valves in gas/vapor service or light liquid service: Determine percent leaking valves using the equation in 40 CFR 63.168(e)(1). Subpart H. [40 CFR 63.168(e)(1)]
- Monitoring frequency shall be calculated per 40 CFR 63.168(e)(2). Nonreparable valves shall be included in the calculation per 63.168(e)(3).
- [40 CFR 63.168(e)(2), 40 CFR 63.168(e)(3)]
- Valves in gas/vapor service or light liquid service (after leak repair): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once within three months (at least) after repair to determine whether the valve has resumed leaking. Subpart H. [40 CFR 63.168(f)(3)]
- Which Months: All Year Statistical Basis: None specified
- Valves in gas/vapor service or light liquid service: Make a first attempt at repair no later than 5 calendar days after a leak is detected, and complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.168(f)]

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- 1088 [40 CFR 63.168(h)(1)] Valves in gas/vapor service or light liquid service (unsafe-to-monitor): Demonstrate that the valve is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.168(b) through (d). Subpart H. [40 CFR 63.168(h)(1)]
- 1089 [40 CFR 63.168(h)(2)] Valves in gas/vapor service or light liquid service (unsafe-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 at the regulation's specified frequency. Maintain a written plan that requires monitoring of the valves as frequently as practicable during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable. Subpart H. [40 CFR 63.168(h)(2)]
- Which Months: All Year Statistical Basis: None specified
- 1090 [40 CFR 63.168(i)(1)] Valves in gas/vapor service or light liquid service (difficult-to-monitor): Demonstrate that the valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface or it is not accessible at anytime in a safe manner. Subpart H. [40 CFR 63.168(i)(1)]
- 1091 [40 CFR 63.168(i)(3)] Valves in gas/vapor service or light liquid service (difficult-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 annually. Maintain a written plan that requires monitoring of the valves at least once per calendar year. Subpart H. [40 CFR 63.168(i)(3)]
- Which Months: All Year Statistical Basis: None specified
- 1092 [40 CFR 63.169(a)] Pumps, valves, connectors, and agitators in heavy liquid service; instrumentation systems; and pressure relief devices in liquid service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 within 5 days (calendar) if evidence of a potential leak to the atmosphere is found by visible, audible, olfactory, or any other detection method. If a reading of 10,000 ppm for agitators, 5,000 ppm for pumps handling polymerizing monomers, 2,000 ppm for all other pumps (including pumps in food medical service), or 500 ppm for valves, connectors, instrumentation systems, and pressure relief devices, or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.169(c). Subpart H. [40 CFR 63.169(a)]
- Which Months: All Year Statistical Basis: None specified
- 1093 [40 CFR 63.169(c)] Pumps, valves, connectors, and agitators in heavy liquid service; instrumentation systems; and pressure relief devices in liquid service: Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after it, each leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.169(c)]
- 1094 [40 CFR 63.170] Surge control vessels and bottoms receivers: Equip with a closed-vent system that routes the organic vapors vented from the surge control vessel or bottoms receiver back to the process or to a control device that complies with the requirements of 40 CFR 63.172, except as provided in 40 CFR 63.162(b), or comply with the requirements of 40 CFR 63.119(b) or (c), if surge control vessel or bottoms receiver is not routed back to the process and meets the conditions specified in 40 CFR 63 Subpart H Table 2 or Table 3. Subpart H.
- The closed vent system and control devices shall be monitored as required by 40 CFR 63.172(a), (c), and (e) thru (j).
- 1095 [40 CFR 63.172] Agitators in gas/vapor service or light liquid service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 monthly to detect leaks, as specified in 40 CFR 63.180(b). If an instrument reading of 10,000 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.173(c). Subpart H. [40 CFR 63.173(a)]
- Which Months: All Year Statistical Basis: None specified
- 1096 [40 CFR 63.173(a)] Agitators in gas/vapor service or light liquid service: Presence of a leak monitored by visual inspection/determination weekly (calendar) for indications of liquids dripping from the agitator. If there are indications of liquids dripping from the agitator, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.173(c). Subpart H. [40 CFR 63.173(b)]
- Which Months: All Year Statistical Basis: None specified
- 1097 [40 CFR 63.173(b)]

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- Agitators in gas/vapor service or light liquid service: Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after it each leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.173(c)]
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Operate with the barrier fluid at a pressure that is at all times greater than the agitator stuffing box pressure; or equip with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to a control device that complies with the requirements of 40 CFR 63.172; or equip with a closed-loop system that purges the barrier fluid into a process stream. Subpart H. [40 CFR 63.173(d)(1)]
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Ensure that the barrier fluid is not in light liquid organic HAP service. Subpart H. [40 CFR 63.173(d)(2)]
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Equip barrier fluid system with a sensor that will detect failure of the seal system, barrier fluid system, or both. Subpart H. [40 CFR 63.173(d)(3)]
- Agitators in gas/vapor service or light liquid service (dual mechanical seal system): Presence of a leak monitored by visual inspection/determination weekly (calendar). Monitor for indications of liquids dripping from the agitator seal. If there are indications of liquid dripping from the agitator seal at the time of the weekly inspection, monitor the agitator as specified in 40 CFR 63.180(b) to determine the presence of organic HAP in the barrier fluid. If an instrument reading of 10,000 ppm or greater is measured, a leak is detected. If a leak is detected, initiate the repair provisions in 40 CFR 63.173(d)(6). Subpart H. [40 CFR 63.173(d)(4)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Determine, based on design considerations and operating experience, criteria that indicates failure of the seal system, the barrier fluid system, or both. Subpart H. [40 CFR 63.173(d)(6)(i)]
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.173(d)(6)]
- Agitators in gas/vapor service or light liquid service (dual mechanical seal system - sensor): Equipment/operational data monitored by visual inspection/determination daily, or equip with an audible alarm unless the agitator is located within the boundary of an unmanned plant site. If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criteria established in 40 CFR 63.173(d)(6), a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.173(d)(6). Subpart H. [40 CFR 63.173(d)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service or light liquid service (unmanned plant site): Presence of a leak monitored by visual inspection/determination at the regulation's specified frequency. Monitor each agitator as often as practicable and at least monthly. Subpart H. [40 CFR 63.173(g)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service or light liquid service (difficult-to-monitor): Demonstrate that the agitator cannot be monitored without elevating the monitoring personnel more than two meters above a support surface or it is not accessible at anytime in a safe manner. Subpart H. [40 CFR 63.173(h)(1)]
- Agitators in gas/vapor service or light liquid service (difficult-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 annually. Maintain a written plan that requires monitoring of the agitator at least once per calendar year. Subpart H. [40 CFR 63.173(h)(3)]
- Which Months: All Year Statistical Basis: None specified

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- Agitators in gas/vapor service or light liquid service (unsafe-to-monitor): Demonstrate that the agitator is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.173(a) through (d). Subpart H. [40 CFR 63.173(j)(1)]
- Agitators in gas/vapor service or light liquid service (unsafe-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 at the regulation's specified frequency. Maintain a written plan that requires monitoring of the agitator as frequently as practicable during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable. Subpart H. [40 CFR 63.173(j)(2)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once within the first 12 months after initial startup or by no later than 12 months after the date of promulgation of a specific subpart that references 40 CFR 63 Subpart H, whichever is later, except as specified in 40 CFR 63.174(f) through (h). If an instrument reading of 500 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.174(d). Subpart H. [40 CFR 63.174(b)(2)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service (0.5% or greater leaking): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 annually. Subpart H. [40 CFR 63.174(b)(3)(i)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service (less than 0.5% leaking): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once every two years. Subpart H. [40 CFR 63.174(b)(3)(ii)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service (opened or otherwise had the seal broken): Presence of a leak monitored by 40 CFR 60, Appendix A, Method 21 within three months after being returned to organic HAP service or when it is reconnected. If monitoring detects a leak, repair according to the provisions of 40 CFR 63.174(d), as specified, except as provided in 40 CFR 63.174(c)(1)(ii). Subpart H. [40 CFR 63.174(c)(1)(i)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service: Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after it each leak is detected, except as provided in 40 CFR 63.171 and 63.174(g). Subpart H. [40 CFR 63.174(d)]
- Connectors in gas/vapor service or light liquid service (unsafe-to-monitor): Demonstrate that the connector is unsafe to monitor because personnel would be exposed to an immediate danger as a result of complying with 40 CFR 63.174(a) through (c). Subpart H. [40 CFR 63.174(f)(1)]
- Connectors in gas/vapor service or light liquid service (unsafe-to-repair): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 at the regulation's specified frequency. Maintain a written plan that requires monitoring of connectors as frequently as practicable during safe-to-monitor times, but not more frequently than the periodic schedule otherwise applicable. Subpart H. [40 CFR 63.174(f)(2)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service (inaccessible, ceramic, or ceramic-lined): Demonstrate that repair personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.174(d). Subpart H. [40 CFR 63.174(g)]
- Connectors in gas/vapor service or light liquid service (inaccessible, ceramic, or ceramic-lined): Make a first attempt at repair within 5 days after leak is detected by visual, audible, olfactory or other means, and complete repairs no later than 15 calendar days after leak is detected, except as provided in 40 CFR 63.171 and 63.174(g). Subpart H. [40 CFR 63.174(h)(2)]

SPECIFIC REQUIREMENTS

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- Connectors in gas/vapor service or light liquid service: Calculate percent leaking connectors as specified in 40 CFR 63.174(i)(1) and (i)(2).
- Subpart H. [40 CFR 63.174(i)]
- Comply with the test methods and procedures requirements provided in 40 CFR 63.180. Subpart H.
- Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Maintain records as specified in 40 CFR 63.181(a) through (k). Subpart H
- Submit Initial Notification: Due within 120 days after the date of promulgation of the subpart that references 40 CFR 63 Subpart H. Include the information specified in 40 CFR 63.182(b)(1). Subpart H. [40 CFR 63.182(b)]
- Submit Initial Notification: Due within 90 days after the date of promulgation of the subpart that references 40 CFR 63 Subpart H. Include the information specified in 40 CFR 63.182(b)(1). Subpart H. [40 CFR 63.182(b)]
- Submit application: Due as soon as practicable before the construction or reconstruction is planned to commence (but it need not be sooner than 90 days after the date of promulgation of the subpart that references 40 CFR 63 Subpart H). Submit application for approval of construction or reconstruction required by 40 CFR 63.5(d) in lieu of the Initial Notification. Subpart H. [40 CFR 63.182(b)]
- Submit Notification of Compliance Status: Due within 90 days of the compliance dates specified in the 40 CFR 63 subpart that references 40 CFR 63 Subpart H. Include the information specified in 40 CFR 63.182(c)(1) through (c)(3). Subpart H. [40 CFR 63.182(c)]
- Submit Periodic Reports: Due semiannually starting 6 months after the Notification of Compliance Status, as required in 40 CFR 63.182(c). Include the information specified in 40 CFR 63.182(d)(2) through (d)(4). Subpart H. [40 CFR 63.182(d)]
- Equip all rotary pumps and compressors handling volatile organic compounds having a true vapor pressure of 1.5 psia or greater at handling conditions with mechanical seals or other equivalent equipment.
- Shall conduct a leak detection and repair (LDAR) program that meets requirements of 40 CFR 63 Subpart H according to the streamlining provisions in Section XII of the permit - Determined as MACT.

FUG0003 P-16 - Reactors

- Vinyl chloride <= 10 ppm, except as provided in 40 CFR 61.64(a)(2) and 61.65(a). Subpart F. [40 CFR 61.64(a)(1)]
- Which Months: All Year Statistical Basis: Three-hour average
- Reactor opening loss: Vinyl chloride <= 0.02 g/kg (0.04 lb/ton) of polyvinyl chloride product, except as provided in 40 CFR 61.64(f)(1), with the product determined on a dry solids basis. Subpart F. [40 CFR 61.64(a)(2)]
- Which Months: All Year Statistical Basis: None specified
- Do not discharge to the atmosphere from any manual vent valve on a polyvinyl chloride reactor in vinyl chloride service, except for an emergency manual vent valve discharge. Subpart F. [40 CFR 61.64(a)(3)]
- Submit a report containing information on the source, nature and cause of the discharge, the date and time of the discharge, the approximate total vinyl chloride loss during the discharge, the method used for determining the vinyl chloride loss (the calculation of the vinyl chloride loss), the action that was taken to prevent the discharge, and measures adopted to prevent future discharges. Subpart F. [40 CFR 61.64(a)(3)]
- Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
- Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]

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- 1136 [40 CFR 61.67(e)]
 1137 [40 CFR 61.67(f)]
 1138 [40 CFR 61.68(c)]
 1139 [40 CFR 61.68(d)]
 1140 [40 CFR 61.68(f)]
 1141 [40 CFR 61.68]
 1142 [40 CFR 61.71(a)]
 1143 [LAC 33:III.501.C.6]
 1144 [LAC 33:III.5109.A]
 1145 [LAC 33:III.5109.A]

Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
 Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
 Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
 Calculate the vinyl chloride content of emissions by best practical engineering judgement based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
 Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
 Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.
 Which Months: All Year Statistical Basis: None specified
 Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]
 Conduct a performance/emissions test on the reactor openings for VCM: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with 40 CFR 61.67(g)(5). Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.
 To ensure compliance with 40 CFR 61.64(e)(2) and MACT determination of 0.38 lbs VCM per million pounds of PVC produced, permittee shall measure and record VCM concentration in reactor prior to each opening using methods and procedures specified in 40 CFR 61 Subpart F, 40 CFR 61.67(g)(5). VCM emissions from each reactor opening, as well as VCM emissions from reactor opening for the last 90 days. These records shall be kept on site and available for inspection by the Office of Environmental Compliance, Surveillance Division. VCM emissions above the maximum listed in this specific condition for any 90 consecutive day period shall be a violation of this permit and must be reported to the Office of Environmental Compliance, Enforcement Division. A report showing the 90 day average for the last 90 day period shall be submitted to the Office of Environmental Compliance, Enforcement Division quarterly. [LAC 33:III.5109.A, 40 CFR 63.50]
 Vinyl chloride <= 0.38 lb/MM lb of PVC produced - Using clean wall technology - Determined as MACT. [40 CFR 63.50, LAC 33:III.5109.A]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER2008001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

FUG0004 P-17 - PVC Unit Fugitive Emissions

1146 [40 CFR 61.65(b)(8)(i)]

Operate a reliable and accurate vinyl chloride monitoring system in accordance with the specifications in 40 CFR 61.65(b)(8)(i) for detection of major leaks and identification of the general area of the plant where a leak is located. Subpart F. [40 CFR 61.65(b)(8)(i)]

1147 [40 CFR 61.65(b)(8)(i)]

Implement a formal leak detection and repair program consistent with 40 CFR 61 Subpart V, except as provided in 40 CFR 61.65(b)(8)(iii). Implement this program within 90 days of the effective date of 40 CFR 61 Subpart F. Subpart F. [40 CFR 61.65(b)(8)(ii)]

1148 [40 CFR 61.65(b)(9)(i)]

Inprocess wastewater (vinyl chloride > 10ppm). Vinyl chloride <= 10 ppm before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]

1149 [40 CFR 61.65(b)(9)(ii)]

Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]

1150 [40 CFR 63.162(c)]

Identify each piece of equipment in a process unit such that it can be distinguished readily from equipment that is not subject to 40 CFR 63 Subpart H. Subpart H. [40 CFR 63.162(c)]

1151 [40 CFR 63.162(f)]

Clearly identify leaking equipment, for leaking equipment detected as specified in 40 CFR 63.163, 40 CFR 63.164, 40 CFR 63.168, 40 CFR 63.169, and 40 CFR 63.172 through 63.174. The identification may be removed after the equipment is repaired, except for valves or for connectors subject to 40 CFR 63.174(c)(1)(i). The identification on a valve may be removed after it has been monitored as specified in 40 CFR 63.168(f)(3) and 63.175(e)(1)(D), and no leak has been detected during the follow-up monitoring. If electing to comply using the provisions of 40 CFR 63.174(c)(1)(i), the identification on a connector may be removed after it is monitored as specified in 40 CFR 63.174(c)(1)(i) and no leak is detected during that monitoring. Subpart H. [40 CFR 63.162(f)]

1152 [40 CFR 63.163(b)(1)]

Pumps in light liquid service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 monthly to detect leaks, except as provided in 40 CFR 63.162(b) and 63.163(e) through (j). If a reading of 10,000 ppm (phase I); 5,000 ppm (phase II); or 5,000 ppm (phase III, pumps handling polymerizing monomers), 2,000 ppm (phase III, pumps in food/medical service), or 1,000 ppm (phase III, all other pumps) or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.163(c). Subpart H. [40 CFR 63.163(b)(1)]

1153 [40 CFR 63.163(b)(3)]

Which Months: All Year Statistical Basis: None specified Pumps in light liquid service: Presence of a leak monitored by visual inspection/determination weekly (calendar). Monitor for indications of liquids dripping from the pump seal. If there are indications of liquids dripping from the pump seal, a leak is detected. If a leak is detected, initiate the repair provisions specified in 40 CFR 63.163(c). Subpart H. [40 CFR 63.163(b)(3)]

1154 [40 CFR 63.163(c)]

Which Months: All Year Statistical Basis: None specified Pumps in light liquid service: Make a first attempt at repair no later than 5 calendar days after a leak is detected, and complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.163(c)(3) and 40 CFR 63.171. Subpart H. [40 CFR 63.163(c)]

1155 [40 CFR 63.163(d)(2)]

Pumps in light liquid service: Implement a quality improvement program for pumps that complies with the requirements of 40 CFR 63.176, if in Phase II, calculated on a 6-month rolling average, the greater of either 10 percent of the pumps in a process unit or three pumps in a process unit leak. Subpart H. [40 CFR 63.163(d)(2)]

1156 [40 CFR 63.163(d)(4)]

Pumps in light liquid service: Determine percent leaking pumps using the equation in 40 CFR 63.163(d)(4). Subpart H. [40 CFR 63.163(d)(4)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

FUG0004 P-17 - PVC Unit Fugitive Emissions

- 1157 [40 CFR 63.163(e)(1)] Pumps in light liquid service (dual mechanical seal system): Operate with the barrier fluid at a pressure that is at all times greater than the pump stuffing box pressure; or equip with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to control device that complies with the requirements of 40 CFR 63.172; or equip with a closed-loop system that purges the barrier fluid into a process stream. Subpart H. [40 CFR 63.163(e)(1)]
- 1158 [40 CFR 63.163(e)(2)] Pumps in light liquid service (dual mechanical seal system): Ensure that the barrier fluid is not in light liquid service. Subpart H. [40 CFR 63.163(e)(2)].
- 1159 [40 CFR 63.163(e)(3)] Pumps in light liquid service (dual mechanical seal system): Equip barrier fluid system with a sensor that will detect failure of the seal system, barrier fluid system, or both. Subpart H. [40 CFR 63.163(e)(3)]
- 1160 [40 CFR 63.163(e)(4)] Pumps in light liquid service (dual mechanical seal system): Presence of a leak monitored by visual inspection/determination weekly (calendar). Monitor for indications of liquids dripping from the pump seal. If there are indications of liquid dripping from the pump seal at the time of the weekly inspection, monitor the pump as specified in 40 CFR 63.180(b) to determine if there is a leak of organic HAP in the barrier fluid. If an instrument reading of 1,000 ppm or greater is measured, a leak is detected. If a leak is detected, initiate the repair provisions in 40 CFR 63.163(e)(6). Subpart H. [40 CFR 63.163(e)(4)]
- 1161 [40 CFR 63.163(e)(6)(i)] Which Months: All Year Statistical Basis: None Specified Pumps in light liquid service (dual mechanical seal system): Determine, based on design considerations and operating experience, criteria that indicates failure of the seal system, the barrier fluid system, or both. Subpart H. [40 CFR 63.163(e)(6)(i)]
- 1162 [40 CFR 63.163(e)(6)] Pumps in light liquid service (dual mechanical seal system): Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.163(e)(6)].
- 1163 [40 CFR 63.163(e)] Pumps in light liquid service (dual mechanical seal system - sensor): Equipment/operational data monitored by visual inspection/determination daily, or equip with an audible alarm unless the pump is located within the boundary of an unmanned plant site. If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criteria established in 40 CFR 63.163(e)(6), a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.163(e)(6). Subpart H. [40 CFR 63.163(e)]
- 1164 [40 CFR 63.163(h)] Which Months: All Year Statistical Basis: None Specified Pumps in light liquid service (unmanned plant site): Presence of a leak monitored by visual inspection/determination at the regulation's specified frequency. Monitor each pump as often as practicable and at least monthly. Subpart V. [40 CFR 63.163(h)]
- 1165 [40 CFR 63.163(j)(1)] Which Months: All Year Statistical Basis: None Specified Pumps in light liquid service (unsafe-to-monitor): Determine that the pump is unsafe-to-monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.163(b) through (d). Subpart H. [40 CFR 63.163(j)(1)]
- 1166 [40 CFR 63.163(j)(2)] Pumps in light liquid service (unsafe-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 at the regulation's specified frequency. Maintain a written plan that requires monitoring of the pump as frequently as practicable during safe-to-monitor times but not more frequently than the periodic monitoring schedule otherwise applicable. Subpart H. [40 CFR 63.163(j)(2)]
- 1167 [40 CFR 63.164(a)] Which Months: All Year Statistical Basis: None Specified Compressors: Equip with a seal system that includes a barrier fluid system and that prevents leakage of process fluid to the atmosphere, except as provided in 40 CFR 63.162(b) and 40 CFR 63.164(h) and (i). Subpart H. [40 CFR 63.164(a)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

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FUG0004 P-17 - PVC Unit Fugitive Emissions

1168 [40 CFR 63.164(b)]

Compressors: Operate the seal system with the barrier fluid at a pressure that is greater than the compressor stuffing box pressure; or equip with a barrier fluid system degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to a control device that complies with the requirements of 40 CFR 63.172; or equip with a closed-loop system that purges the barrier fluid directly into a process stream. Subpart H. [40 CFR 63.164(b)]

1169 [40 CFR 63.164(c)]

Compressors: Ensure that the barrier fluid is not in liquid service. Subpart H. [40 CFR 63.164(c)]

1170 [40 CFR 63.164(d)]

Compressors: Equip each barrier fluid system as described in 40 CFR 63.164(a) through (c) with a sensor that will detect failure of the seal system, barrier fluid system, or both. Subpart H. [40 CFR 63.164(d)]

1171 [40 CFR 63.164(e)(2)]

Compressors (sensor): Determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both. Subpart H. [40 CFR 63.164(e)(2)]

1172 [40 CFR 63.164(g)]

Compressors: Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after each leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.164(g)]

1173 [40 CFR 63.164(i)(2)]

Compressors (no detectable emissions): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once initially and annually, and at other times requested by DEQ. Subpart H. [40 CFR 63.164(i)(2)]

1174 [40 CFR 63.164]

Which Months: All Year Statistical Basis: None specified
Compressors (sensor): Equipment/operational data monitored by visual inspection/determination daily, or equip with an alarm, unless the compressor is located within the boundary of an unannounced plant site. If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined under 40 CFR 63.164(e)(2), a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.164(g). Subpart H.

1175 [40 CFR 63.165(a)]

Which Months: All Year Statistical Basis: None specified
Pressure relief device in gas/vapor service: Organic HAP < 500 ppm above background except during pressure releases, as determined by the method specified in 63.180(c). Subpart H. [40 CFR 63.165(a)]
Which Months: All Year Statistical Basis: None specified
Pressure relief devices in gas/vapor service: After each pressure release, return to a condition indicated by an instrument reading of less than 500 ppm above background, as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.165(b)(1)]

1176 [40 CFR 63.165(b)(1)]

Pressure relief devices in gas/vapor service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21, within 5 days (calendar) after the pressure release and being returned to organic HAP service, to confirm the condition indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in 40 CFR 63.180(c). Subpart H. [40 CFR 63.165(b)(2)]
Which Months: All Year Statistical Basis: None specified
Pressure relief devices in gas/vapor service (rupture disk): After each pressure release, install a new rupture disk upstream of the pressure relief device as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in 40 CFR 63.171. Subpart V. [40 CFR 63.165(d)(2)]

1177 [40 CFR 63.165(b)(2)]

Sampling connection systems: Equip with a closed-purge, closed-loop, or closed-vent system, except as provided in 40 CFR 63.162(b). Operate the system as specified in 40 CFR 63.166(b). Subpart H.

1178 [40 CFR 63.165(d)(2)]

Sampling connection systems: Equip with a closed-purge, closed-loop, or closed-vent system, except as provided in 40 CFR 63.162(b). Operate the system as specified in 40 CFR 63.166(b). Subpart H.

1179 [40 CFR 63.166]

SPECIFIC REQUIREMENTS

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FUG0004 P-17 - PVC Unit Fugitive Emissions

- 1180 [40 CFR 63.167] Open-ended valves or lines: Equip with a cap, blind flange, plug, or a second valve, except as provided in 40 CFR 63.162(b) and 40 CFR 63.167(d) and (e). Ensure that the cap, blind flange, plug or second valve seals the open end at all times except during operations requiring process fluid flow through the open-ended valve or line, or during maintenance or repair. Operate each open-ended valve or line equipped with a second valve in a manner such that the valve on the process fluid end is closed before the second valve is closed. Subpart H.
- Valves in gas/vapor service or light liquid service (Phase II): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 quarterly, as specified in 40 CFR 63.180(b). If an instrument reading of 500 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.168(f). Subpart H. [40 CFR 63.168(c)]
- Which Months: All Year Statistical Basis: None specified
- Valves in gas/vapor service or light liquid service (Phase III, 2 percent or greater leaking valves): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 monthly, as specified in 40 CFR 63.180(b); or implement a quality improvement program for valves that complies with the requirements of 40 CFR 63.175 and monitor quarterly. If an instrument reading of 500 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.168(f). If electing to implement a quality improvement program, follow the procedures in 40 CFR 63.175. Subpart H. [40 CFR 63.168(d)(1)]
- Which Months: All Year Statistical Basis: None specified
- Valves in gas/vapor service or light liquid service (Phase III, less than 2 percent leaking valves): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 quarterly, as specified in 40 CFR 63.180(b). If an instrument reading of 500 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.168(f). Permittee may elect to comply with the alternate standards in 40 CFR 63.168(d)(3) and (d)(4). Subpart H. [40 CFR 63.168(d)(2)]
- Which Months: All Year Statistical Basis: None specified
- Valves in gas/vapor service or light liquid service: Determine percent leaking valves using the equation in 40 CFR 63.168(e)(1). Subpart H. [40 CFR 63.168(e)(1)]
- Valves in gas/vapor service or light liquid service (after leak repair): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once within three months (at least) after repair to determine whether the valve has resumed leaking. Subpart H. [40 CFR 63.168(f)(3)]
- Which Months: All Year Statistical Basis: None specified
- Valves in gas/vapor service or light liquid service: Make a first attempt at repair no later than 5 calendar days after a leak is detected, and complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.168(f)]
- Valves in gas/vapor service or light liquid service (unsafe-to-monitor): Demonstrate that the valve is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.168(b) through (d). Subpart H. [40 CFR 63.168(h)(1)]
- Valves in gas/vapor service or light liquid service (unsafe-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 at the regulation's specified frequency. Maintain a written plan that requires monitoring of the valves as frequently as practicable during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable. Subpart H. [40 CFR 63.168(h)(2)]
- Which Months: All Year Statistical Basis: None specified
- Valves in gas/vapor service or light liquid service (difficult-to-monitor): Demonstrate that the valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface or it is not accessible at anytime in a safe manner. Subpart H. [40 CFR 63.168(i)(1)]

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FUG0004 P-17 - PVC Unit Fugitive Emissions

- 1190 [40 CFR 63.168(i)(3)] Valves in gas/vapor service or light liquid service (difficult-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 annually. Maintain a written plan that requires monitoring of the valves at least once per calendar year. Subpart H. [40 CFR 63.168(i)(3)]
- Which Months: All Year Statistical Basis: None specified
- Pumps, valves, connectors, and agitators in heavy liquid service; instrumentation systems; and pressure relief devices in liquid service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 within 5 days (calendar) if evidence of a potential leak to the atmosphere is found by visible, audible, olfactory, or any other detection method. If a reading of 10,000 ppm for agitators, 5,000 ppm for pumps handling polymerizing monomers, 2,000 ppm for all other pumps (including pumps in food/medical service), or 500 ppm for valves, connectors, instrumentation systems, and pressure relief devices, or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.169(c). Subpart H. [40 CFR 63.169(a)]
- Which Months: All Year Statistical Basis: None specified
- Pumps, valves, connectors, and agitators in heavy liquid service; instrumentation systems; and pressure relief devices in liquid service: Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after it each leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.169(c)]
- Surge control vessels and bottoms receivers: Equip with a closed-vent system that routes the organic vapors vented from the surge control vessel or bottoms receiver back to the process or to a control device that complies with the requirements of 40 CFR 63.172, except as provided in 40 CFR 63.162(b), or comply with the requirements of 40 CFR 63.119(h) or (c), if surge control vessel or bottoms receiver is not routed back to the process and meets the conditions specified in 40 CFR 63 Subpart H Table 2 or Table 3. Subpart H.
- Agitators in gas/vapor service or light liquid service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 monthly to detect leaks, as specified in 40 CFR 63.180(b). If an instrument reading of 10,000 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.173(c). Subpart H. [40 CFR 63.173(a)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service or light liquid service: Presence of a leak monitored by visual inspection/determination weekly (calendar) for indications of liquids dripping from the agitator. If there are indications of liquids dripping from the agitator, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.173(c). Subpart H. [40 CFR 63.173(b)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service or light liquid service: Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after it each leak is detected, except as provided in 40 CFR 63.171. Subpart H. [40 CFR 63.173(c)]
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Operate with the barrier fluid at a pressure that is at all times greater than the agitator stuffing box pressure; or equip with a barrier fluid degassing reservoir that is routed to a process or fuel gas system or connected by a closed-vent system to a control device that complies with the requirements of 40 CFR 63.172; or equip with a closed-loop system that purges the barrier fluid into a process stream. Subpart H. [40 CFR 63.173(d)(1)]
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Ensure that the barrier fluid is not in light liquid organic HAP service. Subpart H. [40 CFR 63.173(d)(2)]
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Equip barrier fluid system with a sensor that will detect failure of the seal system, barrier fluid system, or both. Subpart H. [40 CFR 63.173(d)(3)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
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FUG0004 P-17 PVC Unit Fugitive Emissions

- 1200 [40 CFR 63.173(d)(4)] Agitators in gas/vapor service or light liquid service (dual mechanical seal system): Presence of a leak monitored by visual inspection/determination weekly (calendar). Monitor for indications of liquids dripping from the agitator seal. If there are indications of liquid dripping from the agitator seal at the time of the weekly inspection, monitor the agitator as specified in 40 CFR 63.180(b) to determine the presence of organic HAP in the barrier fluid. If an instrument reading of 10,000 ppm or greater is measured, a leak is detected, initiate the repair provisions in 40 CFR 63.173(d)(6). Subpart H. [40 CFR 63.173(d)(4)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Determine, based on design considerations and operating experience, criteria that indicates failure of the seal system, the barrier fluid system, or both. Subpart H. [40 CFR 63.173(d)(6)(i)]
- Agitators in gas/vapor service and light liquid service (dual mechanical seal system): Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 1.5 calendar days after the leak is detected, except as provided in 40 CFR 63.171.
- Subpart H. [40 CFR 63.173(d)(6)]
- Agitators in gas/vapor service or light liquid service (dual mechanical seal system - sensor): Equipment/operational data monitored by visual inspection/determination daily, or equip with an audible alarm unless the agitator is located within the boundary of an unmanned plant site. If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criteria established in 40 CFR 63.173(d)(6), a leak is detected. If a leak is detected, initiate repair provisions specified in 40 CFR 63.173(d)(6). Subpart H. [40 CFR 63.173(d)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service or light liquid service (unmanned plant site): Presence of a leak monitored by visual inspection/determination at the regulation's specified frequency. Monitor each agitator as often as practicable and at least monthly. Subpart H. [40 CFR 63.173(g)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service or light liquid service (difficult-to-monitor): Demonstrate that the agitator cannot be monitored without elevating the monitoring personnel more than two meters above a support surface or it is not accessible at anytime in a safe manner. Subpart H. [40 CFR 63.173(h)(1)]
- Agitators in gas/vapor service or light liquid service (difficult-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 annually. Maintain a written plan that requires monitoring of the agitator at least once per calendar year. Subpart H. [40 CFR 63.173(h)(3)]
- Which Months: All Year Statistical Basis: None specified
- Agitators in gas/vapor service or light liquid service (unsafe-to-monitor): Demonstrate that the agitator is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.173(a) through (d). Subpart H. [40 CFR 63.173(j)(1)]
- Agitators in gas/vapor service or light liquid service (unsafe-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 at the regulation's specified frequency. Maintain a written plan that requires monitoring of the agitator as frequently as practicable during safe-to-monitor times, but not more frequently than the periodic monitoring schedule otherwise applicable. Subpart H. [40 CFR 63.173(j)(2)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service: Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once within the first 12 months after initial startup or by no later than 12 months after the date of promulgation of a specific subpart that references 40 CFR 63 Subpart H, whichever is later, except as specified in 40 CFR 63.174(f) through (h). If an instrument reading of 500 ppm or greater is recorded, a leak is detected. If a leak is detected, initiate repair provisions in 40 CFR 63.174(d). Subpart H. [40 CFR 63.174(b)(2)]
- Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 1265578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20090001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

FUG0004 P-17 - PVC Unit Fugitive Emissions

- 1210 [40 CFR 63.174(b)(3)(v)] Connectors in gas/vapor service or light liquid service (0.5% or greater leaking): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 annually. Subpart H. [40 CFR 63.174(b)(3)(i)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service (less than 0.5% leaking): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once every two years. Subpart H. [40 CFR 63.174(b)(3)(ii)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service (opened or otherwise had the seal broken): Presence of a leak monitored by 40 CFR 60, Appendix A, Method 21 within three months after being returned to organic HAP service or when it is reconnected. If monitoring detects a leak, repair according to the provisions of 40 CFR 63.174(d), as specified, except as provided in 40 CFR 63.174(c)(1)(ii). Subpart H. [40 CFR 63.174(c)(1)(i)]
- Which Months: All Year Statistical Basis: None specified
- Connectors in gas/vapor service or light liquid service: Make a first attempt at repair no later than 5 calendar days after each leak is detected, and complete repairs no later than 15 calendar days after it each leak is detected, except as provided in 40 CFR 63.171 and 63.174(g). Subpart H. [40 CFR 63.174(d)]
- Connectors in gas/vapor service or light liquid service (unsafe-to-monitor): Demonstrate that the connector is unsafe to monitor because personnel would be exposed to an immediate danger as a result of complying with 40 CFR 63.174(a) through (c). Subpart H. [40 CFR 63.174(f)(1)]
- Connectors in gas/vapor service or light liquid service (unsafe-to-monitor): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 at the regulation's specified frequency. Maintain a written plan that requires monitoring of connectors as frequently as practicable during safe to monitor times, but not more frequently than the periodic schedule otherwise applicable. Subpart H. [40 CFR 63.174(f)(2)]
- Which Months: All Year Statistical Basis: None specified.
- Connectors in gas/vapor service or light liquid service (unsafe-to-repair): Demonstrate that repair personnel would be exposed to an immediate danger as a consequence of complying with 40 CFR 63.174(d). Subpart H. [40 CFR 63.174(g)]
- Connectors in gas/vapor service or light liquid service (inaccessible, ceramic, or ceramic-lined): Make a first attempt at repair within 5 days after leak is detected by visual, audible, olfactory or other means, and complete repairs no later than 15 calendar days after leak is detected, except as provided in 40 CFR 63.171 and 63.174(g). Subpart H. [40 CFR 63.174(h)(2)]
- Connectors in gas/vapor service or light liquid service: Calculate percent leaking connectors as specified in 40 CFR 63.174(i)(1) and (i)(2). Subpart H. [40 CFR 63.174(i)]
- Comply with the test methods and procedures requirements provided in 40 CFR 63.180. Subpart H.
- Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Maintain records as specified in 40 CFR 63.181(a) through (K). Subpart H.
- Submit initial notification. Due within 90 days after the date of promulgation of the subpart that references 40 CFR 63 Subpart H. Include the information specified in 40 CFR 63.182(b)(1). Subpart H. [40 CFR 63.182(b)]
- Submit application: Due as soon as practicable before the construction or reconstruction is planned to commence (but it need not be sooner than 90 days after the date of promulgation of the subpart that references 40 CFR 63 Subpart H). Submit application for approval of construction or reconstruction required by 40 CFR 63.5(d) in lieu of the initial notification. Subpart H. [40 CFR 63.182(b)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

FUG0004 P-17 - PVC Unit Fugitive Emissions

- 1223 [40 CFR 63.182(c)] Submit Notification of Compliance Status: Due within 90 days of the compliance dates specified in the 40 CFR 63 subpart that references 40 CFR 63 Subpart H. Include the information specified in 40 CFR 63.182(c)(1) through (c)(3). Subpart H. [40 CFR 63.182(c)]
 1224 [40 CFR 63.182(d)] Submit Periodic Reports: Due semiannually starting 6 months after the Notification of Compliance Status, as required in 40 CFR 63.182(c). Include the information specified in 40 CFR 63.182(d)(2) through (d)(4). Subpart H. [40 CFR 63.182(d)]
 1225 [LAC 33:III.21.11] Equip all rotary pumps and compressors handling volatile organic compounds having a true vapor pressure of 1.5 psia or greater at handling conditions with mechanical seals or other equivalent equipment.
 1226 [LAC 33:III.5109.A] Shall conduct a leak detection and repair (LDAR) program that meets requirements of 40 CFR 63 Subpart H according to the streamlining provisions in Section XII of the permit - Determined as MACT. [LAC 33:III.5109.A, 40 CFR 61.15, 40 CFR 61.15, 40 CFR 63.50]

FUG0005 U-6 - Fugitive Emission(Bio)

- 1227 [LAC 33:III.5109.A] No additional control is determined as MACT for vinyl chloride - Determined as MACT.

GRP0002 U-CAP - Utility Boiler CAP

Group Member: EQT0039 EQT0040 EQT0041 EQT0042

- 1228 [LAC 33:III.501.C.6] Fuel Flow rate <= 5710 billion BTU/yr. [LAC 33:III.501.C.6, 40 CFR 52, LAC 33:III.509]
 Which Months: All Year Statistical Basis: Twelve-consecutive-month maximum
 1229 [LAC 33:III.507.H.1.a] Flow rate Fuel Subunit Periodic Report: Due annually, by the 31st of March.
 1230 [LAC 33:III.507.H.1.a] Fuel Flow rate monitored by flow rate monitoring device monthly.
 Which Months: All Year Statistical Basis: Monthly total

GRP0003 P-CAP - Delivery Silo CAP

Group Members: EQT0032 EQT0033 EQT0034 EQT0035 EQT0036 EQT0037

- 1231 [LAC 33:III.501.C.6] PVC Production rate <= 1300 MM lbs/yr.
 Which Months: All Year Statistical Basis: Twelve-consecutive-month maximum
 1232 [LAC 33:III.507.H.1.a] PVC Production rate monitored by inventory records and calculations monthly.
 1233 [LAC 33:III.507.H.1.a] Which Months: All Year Statistical Basis: Monthly total
 Production rate PVC Submit Periodic Report: Due annually, by the 31st of March.

TRT0001 M-5 - Gas Thermal Oxidizer A

- 1234 [40 CFR 60.45c(e)] Conduct an initial performance test as required under 40 CFR 60.8 and subsequent performance tests as required by DEQ to demonstrate compliance with the particulate matter standards following the procedures and reference methods specified in 40 CFR 60.45c(a)(1) through (a)(8). Subpart Dc. [40 CFR 60.45c(a)]

SPECIFIC REQUIREMENTS

AI ID: 126577 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

TRT0001 M-5 - Gas Thermal Oxidizer A

- 1235 [40 CFR 60.48(c)(a)]
 Submit notification: Due as specified in 40 CFR 60.7. Submit the date of construction or reconstruction, anticipated startup, and actual startup.
 Include the information specified in 40 CFR 60.48(c)(1) through (a)(4) as applicable. Subpart Dc. [40 CFR 60.48c(a)]
- 1236 [40 CFR 60.48(c)(b)]
 Submit the performance test data from the initial and any subsequent performance tests, and, if applicable, the performance evaluation of the CEMS and/or COMS using the applicable performance specifications in 40 CFR 60 Appendix B. Subpart Dc. [40 CFR 60.48c(b)]
- 1237 [40 CFR 60.48(c)(g)]
 Fuel rate recordkeeping by electronic or hard copy daily. Keep records of the amount of each fuel combusted during each day. Subpart Dc. [40 CFR 60.48c(g)]
- 1238 [40 CFR 60.48(c)(i)]
 Maintain all records required under 40 CFR 60.48c for a period of 2 years following the date of such record. Subpart Dc. [40 CFR 60.48c(i)]
- 1239 [40 CFR 61.349(a)(1)(i)]
 Closed-vent system: Operate with no detectable emissions as indicated by an instrument reading of less than 500 ppmv above background, as determined initially and thereafter at least once per year by the methods specified in 40 CFR 61.355(h). Subpart FF. [40 CFR 61.349(a)(1)(i)]
- 1240 [40 CFR 61.349(a)(1)(ii)]
 Closed-vent system (bypass lines): Flow monitored by flow indicator once every 15 minutes, except as provided in 40 CFR 61.349(a)(1)(ii)(B).
 Install the flow indicator at the entrance to any bypass line that could divert the vent stream away from the control device to the atmosphere.
 Subpart FF. [40 CFR 61.349(a)(1)(ii)]
- Which Months: All Year Statistical Basis: None specified
 Closed-vent system (bypass lines): Flow recordkeeping by electronic or hard copy once every 15 minutes. Subpart FF. [40 CFR 61.349(a)(1)(ii)]
- 1241 [40 CFR 61.349(a)(1)(xi)]
 Closed-vent system: Ensure that all gauging and sampling devices are gas-tight except when gauging or sampling is taking place. Subpart FF.
 [40 CFR 61.349(a)(1)(xi)]
- 1242 [40 CFR 61.349(a)(1)(xiii)]
 Closed-vent system: Residence time \geq 0.5 sec at a minimum temperature of 760 degrees C (1400 degrees F). Subpart FF. [40 CFR 61.349(a)(2)(i)(C)]
- 1243 [40 CFR 61.349(a)(2)(i)(C)]
 Which Months: All Year Statistical Basis: None specified
 Operate at all times when waste is placed in the waste management unit vented to the control device except when maintenance or repair of the waste management unit cannot be completed without a shutdown of the control device. Subpart FF. [40 CFR 61.349(b)]
- 1244 [40 CFR 61.349(b)]
 Demonstrate that each control device, except for a flare, achieves the appropriate conditions specified in 40 CFR 61.349(a)(2) using one of methods specified in 40 CFR 61.349(c)(1) and (c)(2). Subpart FF. [40 CFR 61.349(c)]
- 1245 [40 CFR 61.349(c)]
 Equipment/operational data monitored by visual inspection/determination once initially and once every quarter thereafter. Include inspection of ductwork and piping and connections to covers and control devices for evidence of visible defects such as holes in ductwork or piping and loose connections. Subpart FF. [40 CFR 61.349(f)]
- 1246 [40 CFR 61.349(f)]
 Which Months: All Year Statistical Basis: None specified
 Make a first effort to repair the closed-vent system and control device as soon as practicable but no later than 5 calendar days after visible defects are observed during an inspection, or if other problems are identified, or if detectable emissions are measured, except as provided in 40 CFR 61.350. Complete repair no later than 15 calendar days after the emissions are detected or the visible defect is observed. Subpart FF. [40 CFR 61.349(g)]
- 1247 [40 CFR 61.354(c)(1)]
 Temperature monitored by temperature monitoring device continuously. Install the temperature sensor at a representative location in the combustion chamber. Subpart FF. [40 CFR 61.354(c)(1)]
- 1248 [40 CFR 61.354(c)(1)]
 Which Months: All Year Statistical Basis: None specified
 Temperature recordkeeping by recorder continuously. Subpart FF. [40 CFR 61.354(c)(1)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

TRT001 M-5 - Gas Thermal Oxidizer A

- Monitoring data monitored by technically sound method daily. Inspect the data recorded by the monitoring equipment to ensure that the control device is operating properly. Subpart FF. [40 CFR 61.354(c)]
 Which Months: All Year Statistical Basis: None Specified
- Closed-vent system (bypass line): Seal or closure mechanism monitored by visual inspection/determination monthly...Check the position of the valve and the condition of the car-seal or closure mechanism required under 40 CFR 61.349(a)(1)(ii) to ensure that the valve is maintained in the closed position and the vent stream is not diverted through the bypass line. Subpart FF. [40 CFR 61.354(h)(1)]
 Which Months: All Year Statistical Basis: None Specified
- Closed-vent system (bypass line): Flow monitored by visual inspection/determination daily. Inspect the readings from each flow monitoring device required by 40 CFR 61.349(a)(1)(ii) to check that vapors are being routed to the control device as required. Subpart FF. [40 CFR 61.354(h)(2)]
 Which Months: All Year Statistical Basis: None Specified
 Determine compliance with 40 CFR 61 Subpart FF using the test methods and procedures specified in 40 CFR 61.355(a) through (i), as applicable. Subpart FF.
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records as specified in 40 CFR 61.356(a) through (n). Maintain each record in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. Subpart FF.
 Vinyl chloride <= 10 ppm. Subpart F. [40 CFR 61.65(b)]
 Which Months: All Year Statistical Basis: Three-hour average
 Vinyl chloride <= 10 ppm as determined by the continuous emission monitor system required under 40 CFR 61.68. Subpart F. [40 CFR 61.65(d)(1)]
 Which Months: All Year Statistical Basis: Three-hour average
 Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
 Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
 Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
 Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
 Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
 Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER2008001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

TRT0001 M-5 - Gas Thermal Oxidizer A

1263 [40 CFR 61.68(f)]

Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]

Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.

Which Months: All Year Statistical Basis: None specified

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)] Organic HAP \geq 98 % reduction by weight, or \leq 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c). For combustion devices, calculate emission reduction or concentration on a dry basis, corrected to 3-percent oxygen. Subpart G. [40 CFR 63.113(a)(2)]

Which Months: All Year Statistical Basis: None specified

Halogenated vent streams: Hydrogen halides and halogens \geq 99 % reduction, or reduce the outlet mass of total hydrogen halides and halogens $< 0.45 \text{ kg/hr}$, whichever is less stringent. Subpart G. [40 CFR 63.113(c)(1)(i)]

Which Months: All Year Statistical Basis: None specified

Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.114(a)(1)]

Which Months: All Year Statistical Basis: None specified

pH monitored by pH instrument continuously. Equip pH instrument with a continuous recorder. Monitor the pH of the scrubber effluent. Subpart G. [40 CFR 63.114(a)(4)(i)]

Which Months: All Year Statistical Basis: None specified

Flow rate monitored by flow rate monitoring device continuously. Equip the flow monitor with a continuous recorder and install at the scrubber influent for liquid flow. Determine gas flow using one of the procedures specified in 40 CFR 63.114(a)(4)(ii)(A) through (a)(4)(ii)(C). Subpart G. [40 CFR 63.114(a)(4)(ii)]

Which Months: All Year Statistical Basis: None specified

Conduct a performance test using the procedures in 40 CFR 63.116(c)(1) through (c)(4). Subpart G. [40 CFR 63.116(c)] Conduct a performance test to determine compliance with the control efficiency or emission limits for hydrogen halides and halogens. Use the procedures in 40 CFR 63.116(d)(1) through (d)(5). Subpart G. [40 CFR 63.116(d)]

Determine the halogen atom mass emission rate prior to the combustor according to the procedures in 40 CFR 63.115(d)(2)(v). Subpart G. [40 CFR 63.116(e)]

Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep up-to-date, readily accessible records of the data specified in 40 CFR 63.117(a)(4) through (a)(8), as applicable. Subpart G. [40 CFR 63.117(a)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

TRT001 M-5 - Gas Thermal Oxidizer A

- 1275 [40 CFR 63.118(a)] Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep up-to-date, readily accessible records of the data specified in 40 CFR 63.118(a)(1) through (a)(4). Subpart G. [40 CFR 63.118(a)]
- 1276 [40 CFR 63.119(e)(1)] Inlet emissions: Organic HAP $\geq 95\%$ reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
- Which Months: All Year Statistical Basis: None specified
- Inlet emissions: Organic HAP $\geq 90\%$ reduction, if it can be demonstrated that the control device installed on a storage vessel on or before December 31, 1992 is designed to reduce inlet emissions of total organic HAP by greater than or equal to 90 percent but less than 95 percent. Subpart G. [40 CFR 63.119(e)(2)]
- Which Months: All Year Statistical Basis: None specified
- Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
- Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate and maintain the control device such that the monitored parameters remain within the ranges specified in the Notification of Compliance Status. Subpart G. [40 CFR 63.119(e)(2)]
- Submit, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)]
- Vapor collection system: Design and operate to collect the organic hazardous air pollutant vapors displaced from tank trucks or railcars during loading, and route them to a process, or to a fuel gas system, or to a control device as provided in 40 CFR 63.126(b). Subpart G. [40 CFR 63.126(a)(1)]
- Vapor collection system: Design and operate such that organic HAP vapors collected at one loading arm will not pass through another loading arm in the rack to the atmosphere. Subpart G. [40 CFR 63.126(a)(2)]
- Ensure that the process, fuel gas system, or control device used to comply with 40 CFR 63 Subpart G will be operating whenever organic HAP emissions are vented to the process, fuel gas system, or control device. Subpart G. [40 CFR 63.126(a)(3)]
- Organic HAP $\geq 98\%$ reduction by weight or exit concentration ≤ 20 ppmv, whichever is less stringent. Subpart G. [40 CFR 63.126(b)(1)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Hydrogen halides and halogens $\geq 99\%$ reduction, or reduce the outlet mass emission rate of total hydrogen halides and halogens < 0.45 kg/hr, whichever is less stringent. Subpart G. [40 CFR 63.126(d)(1)(i)]
- Which Months: All Year Statistical Basis: None specified
- Vent system: Secure each valve in the vent system that would divert the vent stream to the atmosphere in a non-diverting position using a car seal or a lock-and-key type configuration; or equip with a flow indicator. Subpart G. [40 CFR 63.126(i)]
- Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.127(a)(1)]
- Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

TRT0001 M-5 - Gas Thermal Oxidizer A

- 1289 [40 CFR 63.127(a)(4)(i)] pH monitored by pH instrument continuously. Equip the pH monitor with a continuous recorder. Monitor the pH of the scrubber effluent.
- Subpart G. [40 CFR 63.127(a)(4)(i)]
 Which Months: All Year Statistical Basis: None specified
 Flow monitored by flow rate monitoring device continuously. Equip the flow meter with a continuous recorder and install at the scrubber influent for liquid flow. Determine gas flow using one of the procedures specified in 40 CFR 63.127(a)(4)(i)-(C). Subpart G. [40 CFR 63.127(a)(4)(ii)]
- Which Months: All Year Statistical Basis: None specified
 [Vent System] Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any by-pass line that could divert the vent stream away from the control device to the atmosphere; OR Secure the by-pass line valve in the closed position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the closed position and the vent stream is not diverted through the by-pass line. If car-seal has been broken or valve position changed, record that the vent stream has been diverted. Return the car-seal or the lock-and-key combination to the secured position as soon as practicable but not later than 15 calendar days after the change in position is detected. Subpart G. [40 CFR 63.127(d)(1), 40 CFR 63.127(d)(2)], 40 CFR 63.127(d)(2)(i)]
 Determine compliance with 40 CFR 63.126 using the methods and procedures specified in 40 CFR 63.128(a) through (h). Subpart G. Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in 40 CFR 63.129(a) through (f). Subpart G.
 Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in 40 CFR 63.130(a) through (d). Subpart G.
 Design, operate and inspect in accordance with the requirements of 40 CFR 63.139. Subpart G. [40 CFR 63.133(b)(2)]
 Closed-vent system: Design, operate and inspect in accordance with the requirements of 40 CFR 63.148, except as provided in 40 CFR 63.133(b)(4). Subpart G. [40 CFR 63.133(b)(3)]
 Design, operate and inspect in accordance with the requirements of 40 CFR 63.139. Subpart G. [40 CFR 63.134(b)(3)]
 Closed-vent system: Design, operate and inspect in accordance with the requirements of 40 CFR 63.148, except as provided in 40 CFR 63.134(b)(5). Subpart G. [40 CFR 63.134(b)(4)]
 Design, operate and inspect the control device in accordance with the requirements of 40 CFR 63.139. Subpart G. [40 CFR 63.137(b)(2)]
 Closed-vent system: Inspect in accordance with the requirements of 40 CFR 63.148. Subpart G. [40 CFR 63.137(b)(3)]
 Ensure that the control device is operating whenever organic hazardous air pollutants emissions are vented to the control device. Subpart G. [40 CFR 63.139(b)]
 Residence time \geq 0.5 sec at a minimum temperature of 760 degrees C. Subpart G. [40 CFR 63.139(c)(1)(iii)]
 Which Months: All Year Statistical Basis: None specified
 Total Organic HAP or Total Organic Compounds (less methane and ethane) $\geq=$ 95 % reduction by weight by removal or destruction by chemical reaction with the scrubbing liquid; or Outlet concentration: Total Organic HAP or TOC (less methane and ethane) $<$ 20 ppmv, whichever is less stringent. Subpart G. [40 CFR 63.139(c)(4)]
 Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
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TRT0001 M-5 - Gas Thermal Oxidizer A

- 1304 [40 CFR 63.139(c)(5)] Total Organic HAP or Total Organic Compounds (less methane and ethane) $\geq 95\%$ reduction by weight; or Outlet concentration: Total Organic HAP or TOC (less methane and ethane) < 20 ppmv, whichever is less stringent. Subpart G. [40 CFR 63.139(c)(5)]
- Which Months: All Year Statistical Basis: None specified
- Demonstrate that each control device or combination of control devices achieves the appropriate conditions specified in 40 CFR 63.139(c) by using one or more of the methods specified in 40 CFR 63.138(d)(1), (d)(2), or (d)(3), except as specified in (d)(4). Subpart G. [40 CFR 63.139(d)]
- 1305 [40 CFR 63.139(d)] Make a first attempt at repair as soon as practicable but no later than 5 calendar days after identification of gaps, cracks, tears, or holes in ductwork, piping, or connections to covers and control devices during an inspection. Complete repairs no later than 15 calendar days after identification or discovery of the defect. Subpart G. [40 CFR 63.139(f)]
- Organic HAP monitored by organic monitoring device continuously. Equip the organic monitoring device with a continuous recorder and install at the outlet of the control device. Subpart G. [40 CFR 63.143(e)(2)]
- Which Months: All Year Statistical Basis: None specified
- Demonstrate compliance with 40 CFR 63.138 by conducting either a design evaluation or performance test as specified in 40 CFR 63.145(a) through (j). Subpart G.
- Vapor collection system or closed vent system (hard-piping): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once initially according to the procedures in 40 CFR 63.148(c). Subpart G. [40 CFR 63.148(b)(1)(i)]
- Which Months: All Year Statistical Basis: None specified
- Vapor collection system or closed vent system (hard-piping): Presence of a leak monitored by visual, audible, and/or olfactory annually. Subpart G. [40 CFR 63.148(b)(1)(ii)]
- Which Months: All Year Statistical Basis: None specified
- Vapor collection system or closed vent system (ductwork): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once initially according to the procedures in 40 CFR 63.148(c). Subpart G. [40 CFR 63.148(b)(2)(i)]
- Which Months: All Year Statistical Basis: None specified
- Vapor collection system or closed vent system (ductwork): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 annually according to the procedures in 40 CFR 63.148(c). Subpart G. [40 CFR 63.148(b)(2)(ii)]
- Which Months: All Year Statistical Basis: None specified
- Vapor collection system or closed vent system (ductwork): Presence of a leak monitored by visual, audible, and/or olfactory annually. Subpart G. [40 CFR 63.148(b)(2)(iii)]
- Which Months: All Year Statistical Basis: None specified
- Fixed roof, cover, or enclosure: Presence of a leak monitored by visual, audible, and/or olfactory once initially and once every six months as specified in 40 CFR 63.133 through 63.137. Subpart G. [40 CFR 63.148(b)(3)]
- Which Months: All Year Statistical Basis: None specified
- Repair leaks (as indicated by an instrument reading greater than 500 ppm above background or by visual inspections) as soon as practicable, except as provided in 40 CFR 63.148(e). Make a first attempt at repair no later than 5 calendar days after the leak is detected. Complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.148(d)(3). Subpart G. [40 CFR 63.148(d)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER2008001
 Permit Number: 1280-0018-V1
 Air - Title V Regular Permit Minor Mod

TRT0001 M-5 - Gas Thermal Oxidizer A

1316 [40 CFR 63.148(h)(1)]

Vapor collection system or closed vent system (bypass lines): Flow monitored by flow indicator once every 15 minutes. Install the flow indicator at the entrance to any bypass line; OR Secure the bypass line with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure the valve is maintained in the closed position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.148(f)(1), 40 CFR 63.148(h)(2)]

1317 [40 CFR 63.148(i)]

Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in 40 CFR 63.148(i)(1) through (i)(6). Subpart G. [40 CFR 63.148(i)]

1318 [40 CFR 63.148(j)]

Submit the information specified in 40 CFR 63.148(j)(1) through (j)(3) with the reports required by 40 CFR 63.182(b) of subpart H or 40 CFR 63.152(c). Subpart G. [40 CFR 63.148(j)]

1319 [LAC 33:III.1101.B]

Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.

1320 [LAC 33:III.1313.C]

Which Months: All Year Statistical Basis: None specified

1321 [LAC 33:III.501.C.6]

Total suspended particulate <= 0.6 lb/MMBTU of heat input. Which Months: All Year Statistical Basis: None specified

1322 [LAC 33:III.501.C.6]

Conduct a performance/emissions test: Due within 180 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources, Method 7E - Determination of Nitrogen Oxides Emissions from Stationary Sources, and Method 10 - Determination of Carbon Monoxide Emissions from Stationary Sources, Method 25A - Determination of Total Gaseous Organic Concentration Using a Flame Ionization Analyzer, Method 027 (CTM-027) for ammonia (proposed in 40 CFR 51 Appendix M). Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Environmental Technology Division, Engineering Services. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.

1323 [LAC 33:III.501.C.6]

Scrubber liquid effluent pH >= 7.5 (no units). VOC, Total <= 0.017 lb/MMBTU - using good combustion practices and gaseous fuel burning. Which Months: All Year Statistical Basis: Three one-hour test average

1324 [LAC 33:III.504]

Nitrogen oxides <= 0.025 lb/MMBTU - using good combustion practices and Selective Catalytic Reduction - Determined as BACT (PSD-LA-709). [LAC 33:III.504, LAC 33:III.509, 40 CFR 52]

1325 [LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average Carbon monoxide <= 0.11 lb/MMBTU - using good combustion practices and gaseous fuel burning - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]

1326 [LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average Particulate matter (10 microns or less) <= 0.0075 lb/MMBTU - using good combustion practices, gaseous fuel burning and a wet scrubber - Determined as BACT (PSD-LA-709). [40 CFR 52, LAC 33:III.509]

1327 [LAC 33:III.509]

Which Months: All Year Statistical Basis: Three one-hour test average Scrubber Liquid Flow rate >= 200 gallons/min. [LAC 33:III.509, 40 CFR 52, LAC 33:III.501.C.6]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

TRT0001 M-5 - Gas Thermal Oxidizer A

VOC, Total $\leq 0.017 \text{ lb/MMBTU}$ (99.99% DRE) using good combustion practices and gaseous fuel burning - Determined as MACT. [LAC 33:III.5109.A, LAC 33.III.509]
 Which Months: All Year Statistical Basis: Three one-hour test average

TRT0002 M-6 - Gas Thermal Oxidizer B

- Conduct an initial performance test as required under 40 CFR 60.8 and subsequent performance tests as required by DEQ to demonstrate compliance with the particulate matter standards following the procedures and reference methods specified in 40 CFR 60.45c(a)(1) through (a)(8). Subpart Dc. [40 CFR 60.45c(a)]
- Submit notification: Due as specified in 40 CFR 60.7. Submit the date of construction or reconstruction, anticipated startup, and actual startup. Include the information specified in 40 CFR 60.48c(a)(1) through (a)(4) as applicable. Subpart Dc. [40 CFR 60.48c(a)]
- Submit the performance test data from the initial and any subsequent performance tests, and, if applicable, the performance evaluation of the CEMs and/or COMs using the applicable performance specifications in 40 CFR 60 Appendix B. Subpart Dc. [40 CFR 60.48c(b)]
- Fuel rate recordkeeping by electronic or hard copy daily. Keep records of the amount of each fuel combusted during each day. Subpart Dc. [40 CFR 60.48c(g)]
- Maintain all records required under 40 CFR 60.48c for a period of 2 years following the date of such record. Subpart Dc. [40 CFR 60.48c(i)]
- Closed-vent system: Operate with no detectable emissions as indicated by an instrument reading of less than 500 ppmv above background, as determined initially and thereafter at least once per year by the methods specified in 40 CFR 61.355(h). Subpart FF. [40 CFR 61.349(a)(1)(i)]
- Closed-vent system (bypass lines): Flow monitored by flow indicator once every 15 minutes, except as provided in 40 CFR 61.349(a)(1)(ii)(B). Install the flow indicator at the entrance to any bypass line that could divert the vent stream away from the control device to the atmosphere. Subpart FF. [40 CFR 61.349(a)(1)(ii)]
- Which Months: All Year Statistical Basis: None specified
- Closed-vent system (bypass lines): Flow recordkeeping by electronic or hard copy once every 15 minutes. Subpart FF. [40 CFR 61.349(a)(1)(ii)]
- Closed-vent system: Ensure that all gauging and sampling devices are gas-tight except when gauging or sampling is taking place. Subpart FF. [40 CFR 61.349(a)(1)(iii)]
- Residence time ≥ 0.5 sec at a minimum temperature of 760 degrees C (1400 degrees F). Subpart FF. [40 CFR 61.349(a)(2)(i)(C)]
- Which Months: All Year Statistical Basis: None specified
- Operate at all times when waste is placed in the waste management unit vented to the control device except when maintenance or repair of the waste management unit cannot be completed without shutdown of the control device. Subpart FF. [40 CFR 61.349(b)]
- Demonstrate that each control device, except for a flare, achieves the appropriate conditions specified in 40 CFR 61.349(a)(2) using one of methods specified in 40 CFR 61.349(c)(1) and (c)(2). Subpart FF. [40 CFR 61.349(c)]
- Equipment/operational data monitored by visual inspection/determination once initially and once every quarter thereafter. Include inspection of ductwork and piping and connections to covers and control devices for evidence of visible defects such as holes in ductwork or piping and loose connections. Subpart FF. [40 CFR 61.349(f)]
- Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
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 Air - Title V Regular Permit Minor Mod

TRT0002 M-6 - Gas Thermal Oxidizer B

- 1342 [40 CFR 61.349(b)] Make a first effort to repair the closed-vent system and control device as soon as practicable but no later than 5 calendar days after visible defects are observed during an inspection, or if other problems are identified, or if detectable emissions are measured, except as provided in 40 CFR 61.350. Complete repair no later than 15 calendar days after the emissions are detected or the visible defect is observed. Subpart FF. [40 CFR 61.349(e)]
- 1343 [40 CFR 61.354(c)(1)] Temperature monitored by temperature monitoring device continuously. Install the temperature sensor at a representative location in the combustion chamber. Subpart FF. [40 CFR 61.354(c)(1)]
- 1344 [40 CFR 61.354(c)(1)] Which Months: All Year Statistical Basis: None specified Temperature recordkeeping by recorder continuously. Subpart FF. [40 CFR 61.354(c)(1)]
- 1345 [40 CFR 61.354(c)] Monitoring data monitored by technically sound method daily. Inspect the data recorded by the monitoring equipment to ensure that the control device is operating properly. Subpart FF. [40 CFR 61.354(c)]
- 1346 [40 CFR 61.354(f)(1)] Which Months: All Year Statistical Basis: None specified Closed-vent system (bypass line): Seal or closure mechanism monitored by visual inspection/determination monthly. Check the position of the valve and the condition of the car-seal or closure mechanism required under 40 CFR 61.349(a)(1)(ii) to ensure that the valve is maintained in the closed position and the vent stream is not diverted through the bypass line. Subpart FF. [40 CFR 61.354(f)(1)]
- 1347 [40 CFR 61.354(f)(2)] Which Months: All Year Statistical Basis: None specified Closed-vent system (bypass line): Flow monitored by visual inspection/determination daily. Inspect the readings from each flow monitoring device required by 40 CFR 61.349(a)(1)(ii) to check that vapors are being routed to the control device as required. Subpart FF. [40 CFR 61.354(f)(2)]
- 1348 [40 CFR 61.355] Which Months: All Year Statistical Basis: None specified Determine compliance with 40 CFR 61 Subpart FF using the test methods and procedures specified in 40 CFR 61.355(a) through (i), as applicable. Subpart FF.
- 1349 [40 CFR 61.356] Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records as specified in 40 CFR 61.356(a) through (n). Maintain each record in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. Subpart FF.
- 1350 [40 CFR 61.65(b)] Vinyl chloride <= 10 ppm. Subpart F. [40 CFR 61.65(b)]
- 1351 [40 CFR 61.65(d)(1)] Which Months: All Year Statistical Basis: Three-hour average Vinyl chloride <= 10 ppm as determined by the continuous emission monitor system required under 40 CFR 61.68. Subpart F. [40 CFR 61.65(d)(1)]
- 1352 [40 CFR 61.67(a)(2)] Which Months: All Year Statistical Basis: Three-hour average Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
- 1353 [40 CFR 61.67(b)] Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- 1354 [40 CFR 61.67(e)] Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- 1355 [40 CFR 61.67(f)] Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]

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1356 [40 CFR 61.68(c)]

Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]

Calculate the vinyl chloride content of emissions by best practical engineering judgment based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(l) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]

Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)].

Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.

Which Months: All Year Statistical Basis: None specified

Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]

Organic HAP $\geq 98\%$ reduction by weight, or ≤ 20 ppmv, whichever is less stringent, as determined using the methods in 40 CFR 63.116(c).

For combustion devices, calculate emission reduction or concentration on a dry basis, corrected to 3-percent oxygen. Subpart G. [40 CFR 63.113(a)(2)]

Which Months: All Year Statistical Basis: None specified

Halogenated vent streams: Hydrogen halides and halogens $\geq 99\%$ reduction, or reduce the outlet mass of total hydrogen halides and halogens < 0.45 kg/hr, whichever is less stringent. Subpart G. [40 CFR 63.113(c)(1)(i)].

Which Months: All Year Statistical Basis: None specified

Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.114(a)(1)]

Which Months: All Year Statistical Basis: None specified

pH monitored by pH instrument continuously. Equip pH instrument with a continuous recorder. Monitor the pH of the scrubber effluent. Subpart G. [40 CFR 63.114(a)(4)(i)]

Which Months: All Year Statistical Basis: None specified

Flow rate monitored by flow rate monitoring device continuously. Equip the flow monitor with a continuous recorder and install at the scrubber influent for liquid flow. Determine gas flow using one of the procedures specified in 40 CFR 63.114(a)(4)(ii)(A) through (a)(4)(ii)(C). Subpart G. [40 CFR 63.114(a)(4)(ii)]

Which Months: All Year Statistical Basis: None specified

Conduct a performance test using the procedures in 40 CFR 63.116(c)(1) through (c)(4). Subpart G. [40 CFR 63.116(c)]

SPECIFIC REQUIREMENTS

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor Mod

TRT0002 M-6 - Gas Thermal Oxidizer B

- 1367 [40 CFR 63.116(e)] Conduct a performance test to determine compliance with the control efficiency or emission limits for hydrogen halides and halogens. Use the procedures in 40 CFR 63.116(d)(1) through (d)(5). Subpart G. [40 CFR 63.116(d)]
- Determine the halogen atom mass emission rate prior to the combustor according to the procedures in 40 CFR 63.115(d)(2)(v). Subpart G. [40 CFR 63.116(e)]
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep up-to-date, readily accessible records of the data specified in 40 CFR 63.117(a)(4) through (a)(8), as applicable. Subpart G. [40 CFR 63.117(a)]
- Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep up-to-date, readily accessible records of the data specified in 40 CFR 63.118(a)(1) through (a)(4). Subpart G. [40 CFR 63.118(a)]
- Inlet emissions: Organic HAP $\geq 95\%$ reduction, except as provided in 40 CFR 63.119(e)(2). If a flare is used, it shall meet the specifications described in the general control device requirements of 40 CFR 63.11(b). Subpart G. [40 CFR 63.119(e)(1)]
- Which Months: All Year Statistical Basis: None specified
- Inlet emissions: Organic HAP $\geq 90\%$ reduction, if it can be demonstrated that the control device installed on a storage vessel on or before December 31, 1992 is designed to reduce inlet emissions of total organic HAP by greater than or equal to 90 percent but less than 95 percent. Subpart G. [40 CFR 63.119(e)(2)]
- Which Months: All Year Statistical Basis: None specified
- Do not exceed 240 hours per year of periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of 40 CFR 63.119(e)(1) or (e)(2). Subpart G. [40 CFR 63.119(e)(3)]
- Prepare a design evaluation, which includes the information specified in 40 CFR 63.120(d)(1)(i), or submit the results of a performance test as described in 40 CFR 63.120(d)(1)(ii). Subpart G. [40 CFR 63.120(d)(1)]
- Monitor the parameters specified in the Notification of Compliance Status required in 40 CFR 63.15(b) or in the operating permit and operate Subpart G. [40 CFR 63.120(d)(3)]
- Submit⁴, as part of the Notification of Compliance Status required by 40 CFR 63.151(b): A monitoring plan containing the information specified in 40 CFR 63.120(d)(2)(i) and in either (d)(2)(ii) or (d)(2)(iii); and, if applicable, (d)(3)(ii). Subpart G. [40 CFR 63.120(d)(3)(i)]
- Vapor collection system: Design and operate to collect the organic hazardous air pollutant vapors displaced from tank trucks or railcars during loading, and route them to a process, or to a fuel gas system, or to a control device as provided in 40 CFR 63.126(b). Subpart G. [40 CFR 63.126(e)(1)]
- Vapor collection system: Design and operate such that organic HAP vapors collected at one loading arm will not pass through another loading arm in the rack to the atmosphere. Subpart G. [40 CFR 63.126(a)(2)]
- Ensure that the process, fuel gas system, or control device used to comply with 40 CFR 63 Subpart G will be operating whenever organic HAP emissions are vented to the process, fuel gas system, or control device. Subpart G. [40 CFR 63.126(a)(3)]
- Organic HAP $\geq 98\%$ reduction by weight or exit concentration ≤ 20 ppmv, whichever is less stringent. Subpart G. [40 CFR 63.126(b)(1)]
- Which Months: All Year Statistical Basis: None specified
- Halogenated vent streams: Hydrogen halides and halogens $\geq 99\%$ reduction, or reduce the outlet mass emission rate of total hydrogen halides and halogens < 0.45 kg/hr, whichever is less stringent. Subpart G. [40 CFR 63.126(d)(1)(i)]
- Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

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Activity Number: PER20080001
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TRT0002 M-6 - Gas Thermal Oxidizer B

- 1382 [40 CFR 63.126(i)] Vent system: Secure each valve in the vent system that would divert the vent stream to the atmosphere in a non-diverting position using a car seal or a lock-and-key type configuration; or equip with a flow indicator. Subpart G. [40 CFR 63.126(i)]
- 1383 [40 CFR 63.127(a)(1)] Temperature monitored by temperature monitoring device continuously. Equip the temperature monitoring device with a continuous recorder and install in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs. Subpart G. [40 CFR 63.127(a)(1)]
- 1384 [40 CFR 63.127(a)(4)(i)] Which Months: All Year Statistical Basis: None specified pH monitored by pH instrument continuously. Equip the pH monitor with a continuous recorder. Monitor the pH of the scrubber effluent. Subpart G. [40 CFR 63.127(a)(4)(i)]
- 1385 [40 CFR 63.127(a)(4)(ii)] Which Months: All Year Statistical Basis: None specified Flow monitored by flow rate monitoring device continuously. Equip the flow meter with a continuous recorder and install at the scrubber influent for liquid flow. Determine gas flow using one of the procedures specified in 40 CFR 63.127(a)(4)(ii) through (a)(4)(ii)(C). Subpart G. [40 CFR 63.127(a)(4)(ii)]
- 1386 [40 CFR 63.127(d)(1)] Which Months: All Year Statistical Basis: None specified Vent System: Flow monitored by flow indicator once every 15 minutes. Equip the flow indicator with a recorder that takes a reading at least once every 15 minutes and install at the entrance to any by-pass line that could divert the vent stream away from the control device to the atmosphere; OR Secure the by-pass line valve in the closed position with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure that the valve is maintained in the closed position and the vent stream is not diverted through the by-pass line. If car-seal has been broken or valve position changed, record that the vent stream has been diverted. Return the car-seal or the lock-and-key combination to the secured position as soon as practicable but not later than 15 calendar after the change in position is detected. Subpart G. [40 CFR 63.127(d)(1), 40 CFR 63.127(d)(2), 40 CFR 63.127(d)(2)i, 40 CFR 63.127(d)(2)ii] Determine compliance with 40 CFR 63.126 using the methods and procedures specified in 40 CFR 63.128(a) through (1). Subpart G.
- 1387 [40 CFR 63.128] Equipment/operational data recordkeeping with 40 CFR 63.126 using the methods and procedures specified in 40 CFR 63.129(a) through (1). Subpart G.
- 1388 [40 CFR 63.129] Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in 40 CFR 63.129(a) through (1). Subpart G.
- 1389 [40 CFR 63.130] Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in 40 CFR 63.130(a) through (d). Subpart G.
- 1390 [40 CFR 63.133(b)(2)] Design, operate and inspect in accordance with the requirements of 40 CFR 63.139. Subpart G. [40 CFR 63.133(b)(2)]
- 1391 [40 CFR 63.133(b)(3)] Closed-vent system: Design, operate and inspect in accordance with the requirements of 40 CFR 63.148, except as provided in 40 CFR 63.133(b)(4). Subpart G. [40 CFR 63.133(b)(3)]
- 1392 [40 CFR 63.134(b)(3)] Design, operate and inspect in accordance with the requirements of 40 CFR 63.139. Subpart G. [40 CFR 63.134(b)(3)]
- 1393 [40 CFR 63.134(b)(4)] Closed-vent system: Design, operate and inspect in accordance with the requirements of 40 CFR 63.148, except as provided in 40 CFR 63.134(b)(5). Subpart G. [40 CFR 63.134(b)(4)]
- 1394 [40 CFR 63.137(b)(2)] Design, operate and inspect the control device in accordance with the requirements of 40 CFR 63.139. Subpart G. [40 CFR 63.137(b)(2)]
- 1395 [40 CFR 63.137(b)(3)] Closed-vent system: Inspect in accordance with the requirements of 40 CFR 63.148. Subpart G. [40 CFR 63.137(b)(3)]
- 1396 [40 CFR 63.139(b)] Ensure that the control device is operating whenever organic hazardous air pollutants emissions are vented to the control device. Subpart G. [40 CFR 63.139(b)]
- 1397 [40 CFR 63.139(c)(1)(iii)] Residence time ≥ 0.5 sec at a minimum temperature of 760 degrees C. Subpart G. [40 CFR 63.139(c)(1)(iii)]
- Which Months: All Year Statistical Basis: None specified

SPECIFIC REQUIREMENTS

A1 ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
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TRT0002 M-6 - Gas Thermal Oxidizer B

- 1398 [40 CFR 63.139(c)(4)] Total Organic HAP or Total Organic Compounds (less methane and ethane) $\geq 95\%$ reduction by weight by removal or destruction by chemical reaction with the scrubbing liquid; or Outlet concentration: Total Organic HAP or TOC (less methane and ethane) $< 20\text{ ppmv}$, whichever is less stringent. Subpart G. [40 CFR 63.139(c)(4)]
- 1399 [40 CFR 63.139(c)(5)] Which Months: All Year Statistical Basis: None specified Total Organic HAP or Total Organic Compounds (less methane and ethane) $\geq 95\%$ reduction by weight; or Outlet concentration: Total Organic HAP or TOC (less methane and ethane) $< 20\text{ ppmv}$, whichever is less stringent. Subpart G. [40 CFR 63.139(c)(5)]
- 1400 [40 CFR 63.139(d)] Which Months: All Year Statistical Basis: None specified Demonstrate that each control device or combination of control devices achieves the appropriate conditions specified in 40 CFR 63.139(c) by using one or more of the methods specified in 40 CFR 63.138(d)(1), (d)(2), or (d)(3), except as specified in (d)(4). Subpart G. [40 CFR 63.139(d)]
- 1401 [40 CFR 63.139(h)] Make a first attempt at repair as soon as practicable but no later than 5 calendar days after identification of gaps, cracks, tears, or holes in ductwork, piping, or connections to covers and control devices during an inspection. Complete repairs no later than 15 calendar days after identification or discovery of the defect. Subpart G. [40 CFR 63.139(h)]
- 1402 [40 CFR 63.143(e)(2)] Organic HAP monitored by organic monitoring device continuously. Equip the organic monitoring device with a continuous recorder and install at the outlet of the control device. Subpart G. [40 CFR 63.143(e)(2)]
- 1403 [40 CFR 63.145] Which Months: All Year Statistical Basis: None specified Demonstrate compliance with 40 CFR 63.138 by conducting either a design evaluation or performance test as specified in 40 CFR 63.145(a) through (j). Subpart G.
- 1404 [40 CFR 63.148(b)(1)(i)] Vapor collection system or closed vent system (hard-piping): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once initially according to the procedures in 40 CFR 63.148(c). Subpart G. [40 CFR 63.148(b)(1)(i)]
- 1405 [40 CFR 63.148(b)(1)(ii)] Which Months: All Year Statistical Basis: None specified Vapor collection system or closed vent system (hard-piping): Presence of a leak monitored by visual, audible, and/or olfactory annually. Subpart G. [40 CFR 63.148(b)(1)(ii)]
- 1406 [40 CFR 63.148(b)(2)(i)] Which Months: All Year Statistical Basis: None specified Vapor collection system or closed vent system (ductwork): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 once initially according to the procedures in 40 CFR 63.148(c). Subpart G. [40 CFR 63.148(b)(2)(i)]
- 1407 [40 CFR 63.148(b)(2)(ii)] Which Months: All Year Statistical Basis: None specified Vapor collection system or closed vent system (ductwork): Organic HAP monitored by 40 CFR 60, Appendix A, Method 21 annually according to the procedures in 40 CFR 63.148(c). Subpart G. [40 CFR 63.148(b)(2)(ii)]
- 1408 [40 CFR 63.148(b)(2)(iii)] Which Months: All Year Statistical Basis: None specified Vapor collection system or closed vent system (ductwork): Presence of a leak monitored by visual, audible, and/or olfactory annually. Subpart G. [40 CFR 63.148(b)(2)(iii)]
- 1409 [40 CFR 63.148(b)(3)] Which Months: All Year Statistical Basis: None specified Fixed roof, cover, or enclosure: Presence of a leak monitored by visual, audible, and/or olfactory once initially and once every six months as specified in 40 CFR 63.133 through 63.137. Subpart G. [40 CFR 63.148(b)(3)]
- Which Months: All Year Statistical Basis: None specified

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TRT0002 M-6 - Gas Thermal Oxidizer B

- 1410 [40 CFR 63.148(d)] Repair leaks (as indicated by an instrument reading greater than 500 ppm above background or by visual inspections) as soon as practicable, except as provided in 40 CFR 63.148(e). Make a first attempt at repair no later than 5 calendar days after the leak is detected. Complete repairs no later than 15 calendar days after the leak is detected, except as provided in 40 CFR 63.148(d)(3). Subpart G. [40 CFR 63.148(d)]
- 1411 [40 CFR 63.148(j)(1)] Vapor collection system or closed vent system (bypass lines): Flow monitored by flow indicator once every 15 minutes. Install the flow indicator at the entrance to any bypass line; OR Secure the bypass line with a car-seal or a lock-and-key type configuration. Seal or closure mechanism monitored by visual inspection/determination monthly to ensure the valve is maintained in the closed position and the vent stream is not diverted through the bypass line. Subpart G. [40 CFR 63.148(f)(1), 40 CFR 63.148(h)(2)]
- Equipment/operational data recordkeeping by electronic or hard copy continuously. Keep records of the information specified in 40 CFR 63.148(i)(1) through (i)(6). Subpart G. [40 CFR 63.148(i)]
- Submit the information specified in 40 CFR 63.148(j)(1) through (j)(3) with the reports required by 40 CFR 63.182(b) of subpart H or 40 CFR 63.152(c). Subpart G. [40 CFR 63.148(j)]
- Opacity <= 20 percent, except during the cleaning of a fire box or building of a new fire, soot blowing or lancing, which may have an opacity in excess of 20 percent for not more than one six-minute period in any 60 consecutive minutes.
- Which Months: All Year Statistical Basis: None specified
- Total suspended particulate <= 0.6 lb/MMBTU of heat input.
- Which Months: All Year Statistical Basis: None specified
- Conduct a performance/emissions test: Due within 180 days after initial startup, or within 60 days after achieving normal production rate or end of the shutdown period, whichever is earliest. The stack test's purpose is to demonstrate compliance with the emission limits of this permit. Test methods and procedures shall be in accordance with New Source Performance Standards, 40 CFR 60, Appendix A, Method 5 - Determination of Particulate Matter Emissions from Stationary Sources, Method 7E - Determination of Nitrogen Oxides Emissions from Stationary Sources, and Method 10 - Determination of Carbon Monoxide Emissions from Stationary Sources, Method 25A - Determination of Total Gaseous Organic Concentration Using a Flame Ionization Analyzer, Method 027 (CRM-027) for ammonia (proposed in 40 CFR 51 Appendix M). Use alternate stack test methods only with the prior approval of the Office of Environmental Assessment, Air Quality Assessment Division. As required by LAC 33:III.913, provide necessary sampling ports in stacks or ducts and such other safe and proper sampling and testing facilities for proper determination of the emission limits.
- Scrubber liquid effluent pH >= 7.5 (no units).
- Submit notification: Due at least 30 days prior to performance/emissions test to the Office of Environmental Assessment, Air Quality Assessment Division, to provide the opportunity to conduct a pretest meeting and observe the emission testing
- Submit report: Due within 60 days after performance/emissions test. Submit emissions test results to the Office of Environmental Assessment, Air Quality Assessment Division.
- Carbon monoxide <= 0.11 lb/MMBTU - using good combustion practices and gaseous fuel burning - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
- Which Months: All Year Statistical Basis: Three one-hour test average
- Nitrogen oxides <= 0.025 lb/MMBTU - using good combustion practices and Selective Catalytic Reduction - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]
- Which Months: All Year Statistical Basis: Three one-hour test average

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TRT0002 M-6 - Gas Thermal Oxidizer B

Particulate matter (10 microns or less) <= 0.0075 lb/MMBTU - using good combustion practices, gaseous fuel burning, and a wet scrubber - Determined as BACT (PSD-LA-709). [LAC 33:III.509, 40 CFR 52]

Which Months: All Year Statistical Basis: Three one-hour test average

Scrubber Liquid Flow rate >= 200 gallons/min. [LAC 33:III.501.C.6, 40 CFR 52, LAC 33:III.509]

Which Months: All Year Statistical Basis: Hourly average

VOC, Total <= 0.017 lb/MMBTU (99.99% DRE) using good combustion practices and gaseous fuel burning - Determined as MACT.

Which Months: All Year Statistical Basis: Three one-hour test average

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Comply with the requirements of PSD-LA-709. This permit includes provisions of the Prevention of Significant Deterioration (PSD) review from Permit PSD-LA-709.

All affected facilities shall comply with all applicable provisions in 40 CFR 60 Subpart A.

Determine compliance with 40 CFR 61 Subpart FF using the test methods and procedures specified in 40 CFR 61.355(a) through (i), as applicable. Subpart FF.

Equipment/operational data recordkeeping by electronic or hard copy continuously Maintain records as specified in 40 CFR 61.356(a) through (n). Maintain each record in a readily accessible location at the facility site for a period not less than two years from the date the information is recorded unless otherwise specified. Subpart FF.

Submit report: Due by initial startup. Submit a report that summarizes the regulatory status of each waste stream subject to 40 CFR 61.342 and is determined by the procedures specified in 40 CFR 61.355(c) to contain benzene. Include the information specified in 40 CFR 61.357(a)(1) through (a)(4). If there is no benzene onsite in wastes, products, by-products, or intermediates, submit an initial report that is a statement to this effect. Subpart FF. [40 CFR 61.357(a)]

Submit report: Due by the date of initial startup. Submit a certification that the equipment necessary to comply with 40 CFR 61 Subpart FF has been installed and that the required initial inspections or tests have been carried out in accordance with 40 CFR 61 Subpart FF. Subpart FF. [40 CFR 61.357(d)(1)]

Submit report: Due annually, beginning on the date that equipment necessary to comply with 40 CFR 61 Subpart FF has been certified in accordance with 40 CFR 61.357(d)(1). Submit updates to the information listed in 40 CFR 61.357(a)(1) through (a)(3) or, if the information in 40 CFR 61.357(a)(1) through (3) is not changed in the following year, a statement to that effect. Subpart FF. [40 CFR 61.357(d)(2)]

Submit report: Due quarterly, beginning three months after the date that the equipment necessary to comply with 40 CFR 61 Subpart FF has been certified in accordance with 40 CFR 61.357(d)(1). Submit a certification that all of the required inspections have been carried out in accordance with the requirements of 40 CFR 61 Subpart FF. Subpart FF. [40 CFR 61.357(d)(6)]

Submit report: Due quarterly, beginning three months after the date that the equipment necessary to comply with 40 CFR 61 Subpart FF has been certified in accordance with 40 CFR 61.357(d)(1). Include the information specified in 40 CFR 61.357(d)(7)(i) through (d)(7)(v). Subpart FF. [40 CFR 61.357(d)(7)]

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- 1434 [40 CFR 61.357(d)(8)] Submit report. Due annually, beginning one year after the date that the equipment necessary to comply with 40 CFR 61 Subpart FF has been certified in accordance with 40 CFR 61.357(d)(1). Submit a report that summarizes all inspections required by 40 CFR 61.342 through 61.354 during which detectable emissions are measured or a problem that could result in benzene emissions is identified, including information about the repairs or corrective action taken. Subpart FF. [40 CFR 61.357(d)(8)]
- 1435 [40 CFR 61.65(b)(9)(i)] Inprocess wastewater (vinyl chloride > 10 ppm): Vinyl chloride \leq 10 ppmw before being mixed with any other inprocess wastewater stream which contains less than 10 ppm vinyl chloride; before being exposed to the atmosphere; before being discharged to a wastewater treatment process; or before being discharged untreated as a wastewater. Subpart F. [40 CFR 61.65(b)(9)(i)]
- Which Months: All Year Statistical Basis: None specified
- Inprocess wastewater: Duct any vinyl chloride removed from inprocess wastewater in accordance with 40 CFR 61.65(b)(9)(i) through a control system from which the concentration of vinyl chloride in the exhaust gases does not exceed 10 ppm (average for 3-hour period), or equivalent as provided in 40 CFR 61.66. Subpart F. [40 CFR 61.65(b)(9)(ii)]
- Test emissions from the source within 90 days of startup. Conduct test as specified in 40 CFR 61.67(c) through (g). Subpart F. [40 CFR 61.67(a)(2)]
- Provide DEQ at least 30 days prior notice of an emission test to afford DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 61.67(b)]
- Submit test results: Due before the close of the next business day following the determination of vinyl chloride emissions. Submit the results by registered letter. Subpart F. [40 CFR 61.67(e)]
- Performance Test Data recordkeeping by electronic or hard copy as needed. Retain at the plant and make available, upon request, for inspection by DEQ, records of emission test results and other data needed to determine emissions. Retain records for a minimum of three years. Subpart F. [40 CFR 61.67(f)]
- Conduct a daily span check for each vinyl chloride monitoring system used, as specified. Subpart F. [40 CFR 61.68(c)]
- Calculate the vinyl chloride content of emissions by best practical engineering judgement based on the discharge duration and known vinyl chloride concentrations in the affected equipment as determined in accordance with 40 CFR 61.67(h) or other acceptable method, for exhaust gases having emission limits that are subject to the requirement of 40 CFR 61.68(a) that are emitted to the atmosphere without passing through the control system and required vinyl chloride monitoring system. Subpart F. [40 CFR 61.68(d)]
- Equipment/operational data recordkeeping by electronic or hard copy upon occurrence of event. For each vinyl chloride emission to the atmosphere determined in accordance with 40 CFR 61.68(e) to be in excess of the applicable emission limits, record the identity of the source(s), the date, time and duration of the excess emission, the cause of the excess emission, and the approximate total vinyl chloride loss during the excess emission, and the method used for determining the vinyl chloride loss. Retain and make available for inspection by DEQ as required by 40 CFR 61.71(a). Subpart F. [40 CFR 61.68(f)]
- Vinyl chloride monitored by continuous emission monitor (CEM) continuously. Monitor emissions from the sources for which emission limits are prescribed in 40 CFR 61.62(a) and (b), 61.63(a), and 61.64(a)(1), (b), (c) and (d), and for any control system to which reactor emissions are required to be ducted in 40 CFR 61.64(a)(2) or to which fugitive emissions are required to be ducted in 40 CFR 61.65(b)(1)(ii) and (b)(2), (b)(5), (b)(6)(ii) and (b)(9)(ii). Use a device that meets the requirements in 40 CFR 61.68(b). Subpart F.
- Which Months: All Year Statistical Basis: None specified

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- 1445 [40 CFR 61.69]
 Submit statement: Due within 90 days of initial startup date. Notify DEQ that the equipment and procedural specifications in 40 CFR 61.65(b)(1) through (b)(8) are being implemented. Also include the information specified in 40 CFR 61.69(c)(1) through (c)(4). Subpart F.
- 1446 [40 CFR 61.70]
 Submit report: Due quarterly, by the 15th of March, June, September and December. Submit report according to the schedule specified in 40 CFR 61.70(a) and (b). Include the information specified in 40 CFR 61.70(c)(1) through (c)(4). Subpart F.
- 1447 [40 CFR 61.71(a)]
 Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Record the information specified in 40 CFR 61.71(a)(1) through (a)(4) and make it available for inspection to DEQ for a minimum of three years. Subpart F. [40 CFR 61.71(a)]
- 1448 [40 CFR 61.]
 All affected facilities shall comply with all applicable provisions in 40 CFR 61 Subpart A.
- 1449 [40 CFR 63.103(b)(1)]
 Conduct performance tests and compliance determinations according to the schedule and procedures in 40 CFR 63.7(a) and the applicable sections of 40 CFR 63 Subparts G and H. Subpart F. [40 CFR 63.103(b)(1)]
- 1450 [40 CFR 63.103(b)(2)]
 Submit Notification: Due at least 30 calendar days before a performance test is scheduled. Notify DEQ of the intention to conduct a performance test to allow DEQ the opportunity to have an observer present during the test. Subpart F. [40 CFR 63.103(b)(2)]
- 1451 [40 CFR 63.103(b)(3)]
 Conduct performance tests according to the provisions in 40 CFR 63.7(e) of subpart A, except conduct performance tests at maximum representative operating conditions for the process. Subpart F. [40 CFR 63.103(b)(3)]
- 1452 [40 CFR 63.103(c)(1)]
 Maintain all applicable records in such a manner that they can be readily accessed. Retain the most recent 6 months of records on site or make accessible by computer or other means that provides access within 2 hours after a request. Subpart F. [40 CFR 63.103(c)(1)]
- 1453 [40 CFR 63.103(c)(2)]
 Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain records specified in 40 CFR 63.103(c)(2) through (iii), as well as records specified in 40 CFR 63 Subparts G and H. Subpart F. [40 CFR 63.103(c)(2)]
- 1454 [40 CFR 63.103(c)]
 Keep copies of all applicable reports and records required by 40 CFR 63 Subparts F, G, and H for at least 5 years. If 40 CFR 63 Subparts G or H require records to be maintained for a time period different than 5 years, maintain those records for the time specified in 40 CFR 63 Subparts G or H. Subpart F. [40 CFR 63.103(c)]
- 1455 [40 CFR 63.104(b)]
 Heat exchange systems (cooling water): HAP monitored by the regulation's specified method(s) monthly for the first 6 months and quarterly thereafter to detect leaks. Monitor for total hazardous air pollutants, total volatile organic compounds, total organic carbon, one or more specified HAP compounds, or other representative substances that would indicate the presence of a leak in the heat exchange system. Subpart F.
- 1456 [40 CFR 63.105(d)]
 Which Months: All Year Statistical Basis: None specified
 Maintenance wastewater: Implement the procedures described in 40 CFR 63.105(b) and (c) as part of the start-up, shutdown and malfunction plan required under 40 CFR 63.6(e)(3). Subpart F. [40 CFR 63.105(d)]
- 1457 [40 CFR 63.105(e)]
 Maintenance wastewater: Equipment/operational data recordkeeping by electronic or hard copy continuously. Maintain a record of the information required by 40 CFR 63.105(b) and (c) as part of the start-up, shut-down, and malfunction plan required under 40 CFR 63.6(e)(3). Subpart F. [40 CFR 63.105(e)]
- 1458 [40 CFR 63.105]
 Maintenance wastewater: Prepare a description of maintenance procedures for the management of wastewaters generated from the emptying and purging of equipment in the process during temporary shutdowns for inspections, maintenance, and repair and during periods which are not shutdowns as specified in 40 CFR 63.105(b)(1) through (b)(3). Modify and update the information required by 40 CFR 63.105(b) as needed following each maintenance procedure based on the actions taken and the wastewaters generated in the preceding maintenance procedure. Subpart F.
- 1459 [40 CFR 63.112(b)]
 Control emissions of organic HAP's to the level represented by the equation listed in 40 CFR 63.112(a). Subpart G. [40 CFR 63.112(b)]

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- 1460 [40 CFR 63.112(d)] Demonstrate compliance with the emission standard in 40 CFR 63.112(b) by following the procedures in 40 CFR 63.112(e). Subpart G. [40 CFR 63.112(d)]
- 1461 [40 CFR 63.151(b)] Submit application for approval of construction or reconstruction required by 40 CFR 63.5(d) in lieu of an Initial Notification. Submit application as soon as practicable before construction or reconstruction is planned to commence (but it need not be sooner than 90 calendar days after the date of promulgation of 40 CFR 63 Subpart G). Include the information specified in 40 CFR 63.151(b)(1) through (b)(1)(v).
- 1462 [40 CFR 63.152(b)] Subpart G. [40 CFR 63.151(b)]
- 1463 [40 CFR 63.152(c)] Subpart G. [40 CFR 63.152(b)(1) through (b)(6), as applicable. Subpart G. [40 CFR 63.152(b)]
- 1464 [40 CFR 63.152(f)] Subpart G. [40 CFR 63.152(c)(5) and (c)(6). Submit the first report no later than 8 months after the date the Notification of Compliance Status is due. Include the information specified in 40 CFR 63.152(c)(2) through (c)(4). Subpart G. [40 CFR 63.152(c)]
- 1465 [40 CFR 63.152(f)] Equipment/operational data recordkeeping by electronic or hard copy at the regulation's specified frequency. Keep records as specified in 40 CFR 63.152(f)(1) through (f)(7). Subpart G. [40 CFR 63.152(f)]
- 1466 [40 CFR 70.5(a)(1)(iii)] All affected facilities shall comply with all applicable provisions in 40 CFR 63 Subpart A as delineated in 40 CFR 63 Subparts G and H.
- 1467 [40 CFR 70.6(a)(3)(iii)(A)] Subpart Title V permit application for renewal: Due six months before permit expiration date. [40 CFR 70.5(a)(1)(iii)]
- 1468 [40 CFR 70.6(a)(3)(iii)(B)] Subpart Title V monitoring results report: Due semiannually, by March 31st and September 30th for the preceding periods encompassing July through December and January through June, respectively. Submit reports to the Office of Environmental Compliance, Surveillance Division. Certify reports by a responsible company official. Clearly identify all instances of deviations from permitted monitoring requirements. For previously reported deviations, in lieu of attaching the individual deviation reports, clearly reference the communication(s)/correspondence(s) constituting the prior report, including the date the prior report was submitted. [40 CFR 70.6(a)(3)(iii)(A)]
- 1469 [40 CFR 70.6(c)(5)(iv)] Subpart Title V excess emissions report: Due quarterly, by June 30, September 30, December 31, March 31. Submit reports of all permit deviations to the Office of Environmental Compliance, Surveillance Division. Certify all reports by a responsible official in accordance with 40 CFR 70.5(d). The reports submitted on March 31 and September 30 may be consolidated with the semi-annual reports required by 40 CFR 70.6(a)(3)(iii)(A) as long as the report clearly indicates this and all required information is included and clearly delineated in the consolidated report. [40 CFR 70.6(a)(3)(iii)(B)]
- 1470 [LAC 33:III.1.103] Subpart Title V compliance certification: Due annually, by the 31st of March. Submit to the Office of Environmental Compliance, Surveillance Division. [40 CFR 70.6(c)(5)(iv)]
- 1471 [LAC 33:III.1.109.B] Emissions of smoke which pass onto or across a public road and create a traffic hazard by impairment of visibility as defined in LAC 33:III.111, or intensify an existing traffic hazard condition are prohibited.
- 1472 [LAC 33:III.1.303.B] Outdoor burning of waste material or other combustible material is prohibited.
- 1473 [LAC 33:III.2.113.A] Emissions of particulate matter which pass onto or across a public road and create a traffic hazard by impairment of visibility or intensify an existing traffic hazard condition are prohibited.
- Maintain best practical housekeeping and maintenance practices at the highest possible standards to reduce the quantity of organic compounds emissions. Good housekeeping shall include, but not be limited to, the practices listed in LAC 33:III.2.113.A.1.-5.

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Failure to pay the prescribed application fee or annual fee as provided herein, within 90 days after the due date, will constitute a violation of these regulations and shall subject the person to applicable enforcement actions under the Louisiana Environmental Quality Act including, but not limited to, revocation or suspension of the applicable permit, license, registration, or variance.

Submit permit application: Due prior to construction, reconstruction or modification unless otherwise provided in LAC 33:III.Chapter 5. Submit a timely and complete permit application to the Office of Environmental Services, Air Permits Division as required in accordance with the procedures in LAC 33:III.Chapter 5.

Any major source as defined in LAC 33:III.502 is designated a Part 70 source and is required to obtain a permit which will meet the requirements of LAC 33:III.507.

Any permit application to renew an existing permit shall be submitted at least six months prior to the date of permit expiration, or at such earlier time as may be required by the existing permit or approved by the permitting authority. In no event shall the application for permit renewal be submitted more than 18 months before the date of permit expiration.

No major stationary source or major modification to which the requirements of this Part apply shall begin actual construction without a permit issued under this Section.

A major stationary source or major modification shall meet each applicable emissions limitation under the Louisiana State Implementation Plan and each applicable emissions standard and standard of performance under the Louisiana New Source Performance Standards (LNSS) and Louisiana Emission Standards for Hazardous Air Pollutants (LESHAP) and Sections 111 and 112 of the Clean Air Act.

A new major stationary source shall apply best available control technology for each pollutant subject to regulation under this Section that it would have the potential to emit in significant amounts.

A major modification shall apply best available control technology for each pollutant subject to regulation under this Section which would result in a significant net emissions increase at the source. This requirement applies to each proposed emissions unit at which a net emissions increase in the pollutant would occur as a result of a physical change or change in the method of operation in the unit.

Do not construct or modify any stationary source subject to any standard set forth in LAC 33:III.Chapter 51.Subchapter A, without first obtaining written authorization from DEQ in accordance with LAC 33:III.Chapter 51.Subchapter A, after the effective date of the standard.

Include a certification statement with the annual emission report and revisions to any emission report that attests that the information contained in the emission report is true, accurate, and complete, and that is signed by a responsible official, as defined in LAC 33:III.502. Include the full name of the responsible official, title, signature, date of signature and phone number of the responsible official.

Submit Annual Emissions Report (TEDI): Due annually, by the 31st of March unless otherwise directed by DEQ, to the Office of Environmental Assessment in a format specified by DEQ. Identify the quantity of emissions in the previous calendar year for any toxic air pollutant listed in Table 51.1 or Table 51.3.

Submit notification: Due to the Department of Public Safety 24-hour Louisiana Emergency Hazardous Materials Hotline at (225) 925-6595 immediately, but in no case later than 1 hour, after any discharge of a toxic air pollutant into the atmosphere that results or threatens to result in an emergency condition (a condition which could reasonably be expected to endanger the health and safety of the public, cause significant adverse impact to the land, water or air environment, or cause severe damage to property).

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- 1486 [LAC 33:III.5107.B.2] Submit notification: Due to SPOC, except as provided in LAC 33:III.5107.B.6, no later than 24 hours after the beginning of any unauthorized discharge into the atmosphere of a toxic air pollutant as a result of bypassing an emission control device, when the emission control bypass was not the result of an upset, and the quantity of the unauthorized bypass is greater than or equal to the lower of the Minimum Emission Rate (MER) in LAC 33:III.5112, Table 51.1, or a reportable quantity (RQ) in LAC 33:III.3931, or the quantity of the unauthorized bypass is greater than one pound and there is no MER or RQ for the substance in question. Submit notification in the manner provided in LAC 33:III.3923.
- 1487 [LAC 33:III.5107.B.3] Submit notification: Due to SPOC, except as provided in LAC 33:III.5107.B.6, immediately, but in no case later than 24 hours after any unauthorized discharge of a toxic air pollutant into the atmosphere that does not cause an emergency condition, the rate or quantity of which is in excess of that allowed by permit, compliance schedule, or variance, or for upset events that exceed the reportable quantity in LAC 33:III.3931.
- 1488 [LAC 33:III.5107.B.4] Submit written report: Due by certified mail to SPOC within seven calendar days of learning of any such discharge or equipment bypass as referred to in LAC 33:III.5107.B.1 through B.3. Include the information specified in LAC 33:III.5107.B.4.a.i through B.4.a.viii.
- 1489 [LAC 33:III.5107.B.5] Report all discharges to the atmosphere of a toxic air pollutant from a safety relief device, a line or vessel rupture, a sudden equipment failure, or a bypass of an emission control device, regardless of quantity, IF THEY CAN BE MEASURED AND CAN BE RELIABLY QUANTIFIED USING GOOD ENGINEERING PRACTICES, to DEQ along with the annual emissions report and where otherwise specified. Include the identity of the source, the date and time of the discharge, and the approximate total loss during the discharge.
- 1490 [LAC 33:III.5109.C] Develop a standard operating procedure (SOP) within 120 days after achieving or demonstrating compliance with the standards specified in LAC 33:III.Chapter 51. Detail in the SOP all operating procedures or parameters established to ensure that compliance with the applicable standards is maintained and address operating procedures for any monitoring system in place, specifying procedures to ensure compliance with LAC 33:III.5113.C.5. Make a written copy of the SOP available on site or at an alternate approved location for inspection by DEQ. Provide a copy of the SOP within 30 days upon request by DEQ.
- 1491 [LAC 33:III.5113.A.1] Submit notification in writing: Due to SPOC not more than 60 days nor less than 30 days prior to initial start-up. Submit the anticipated date of the initial start-up.
- 1492 [LAC 33:III.5113.A.2] Submit notification in writing: Due to SPOC within 10 working days after the actual date of initial start-up of the source. Submit the actual date of initial start-up of the source.
- 1493 [LAC 33:III.511] Submit notification: Due to the permitting authority prior to the initiation of any project which will result in emission reductions. Include in the notification a description of the proposed action, a location map, a description of the composition of air contaminants involved, the rate and temperature of the emissions, the identity of the sources involved and the change in emissions. Make any appropriate permit revision reflecting the emission reduction no later than 180 days after commencement of operation and in accordance with the procedures of LAC 33:III.Chapter 5.
- 1494 [LAC 33:III.517.A.1] Submit permit application: Due prior to commencement of construction, reconstruction, or modification of the source, for new or modified sources. Do not commence construction, reconstruction, or modification of any source required to be permitted under LAC 33:III.Chapter 5 prior to approval by the permitting authority.
- 1495 [LAC 33:III.517.B.1] Any application form, report, or compliance certification submitted under this Chapter shall contain certification by a responsible official of truth, accuracy, and completeness. The certification shall state that, based on information and belief formed after reasonable inquiry, the statements and information contained in the application are true, accurate, and complete.

SPECIFIC REQUIREMENTS**AI ID:** 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant**Activity Number:** PER20080001**Permit Number:** 1280-00118-V1**Air - Title V Regular Permit Minor Mod****UNEF0003 Shintech Plaquemine Plant 1**

1496 [LAC 33:III.517.C]

Submit supplementary facts or corrected information: Due promptly upon becoming aware of failure to submit or incorrect submittal regarding permit applications. In addition, provide information as necessary to address any requirements that become applicable to the source after the date of filing a complete application but prior to release of a proposed permit.

1497 [LAC 33:III.517.D]

Submit applications for permits in accordance with forms and guidance provided by the DEQ. At a minimum, each permit application submitted under LAC 33:III. Chapter 5 shall contain the information specified in LAC 33:III.517.D, subparagraphs 1-18. In addition to those elements listed under LAC 33:III.517.D, include in each application pertaining to a Part 70 source the information specified in LAC 33:III.517.E, Subparagraphs 1-8.

1498 [LAC 33:III.517.E]

Submit notification: Due within 90 days after any change in ownership of the source. Provide the notification in accordance with forms or guidance from the permitting authority and in accordance with requirements of LAC 33:I.1701.

1499 [LAC 33:III.517.G]

Submit permit modification application: Due within 45 days of obtaining relevant test results. The permit modification or amendment shall include all information necessary to process the request, and is required if testing demonstrates that the terms and conditions of the existing permit are inappropriate or inaccurate.

1500 [LAC 33:III.523.A]

Submit application for temporary exemption for testing: Due prior to test initiation. Submit the information specified in LAC 33:III.517 (with the exception of the data being measured in the test). Conduct testing for the minimum duration consistent with obtaining valid results.

1501 [LAC 33:III.523.B.2]

Submit test results: Due within 30 days of test completion to the administrative authority. The report details the conditions that were found to exist during a temporary exemption for testing. State if there is to be no permanent change in emissions from pretest conditions.

1502 [LAC 33:III.523.B.3]

Activate the preplanned abatement strategy listed in LAC 33:III.561.1. Table 5 when the administrative authority declares an Air Pollution Alert.

1503 [LAC 33:III.5609.A.1.b]

Activate the preplanned strategy listed in LAC 33:III.561.1. Table 6 when the administrative authority declares an Air Pollution Warning.

1504 [LAC 33:III.5609.A.2.b]

Activate the preplanned abatement strategy listed in LAC 33:III.561.1. Table 7 when the administrative authority declares an Air Pollution Emergency.

1505 [LAC 33:III.5609.A.3.b]

Prepare standby plans for the reduction of emissions during periods of Air Pollution Alert, Air Pollution Warning and Air Pollution Emergency. Design standby plans to reduce or eliminate emissions in accordance with the objectives as set forth in LAC 33:III.561.1. Tables 5, 6, and 7. Comply with the provisions in 40 CFR 68, except as specified in LAC 33:III.5901.

1506 [LAC 33:III.5609.A]

Identify hazards that may result from accidental releases of the substances listed in 40 CFR 68.130, Table 59.0 of LAC 33:III.5907, or Table 59.1 of LAC 33:III.5913 using appropriate hazard assessment techniques, design and maintain a safe facility, and minimize the off-site consequences of accidental releases of such substances that do occur.

1507 [LAC 33:III.5901.A]

Submit registration: Due January 31, 1993, or within 60 days after the source becomes subject to LAC 33:III. Chapter 59, whichever is later. Include the information listed in LAC 33:III.5911.B, and submit to the Department of Environmental Quality, Office of Environmental Compliance, Surveillance Division.

1508 [LAC 33:III.5907]

Submit amended registration: Due to the Department of Environmental Quality, Office of Environmental Compliance, Surveillance Division within 60 days after the information in the submitted registration is no longer accurate.

1509 [LAC 33:III.5911.A]

Submit Emission Inventory (EI) Annual Emissions Statement: Due annually, by the 31st of March for the period January 1 to December 31 of the previous year. Submit emission inventory data in the format specified by the Office of Environmental Assessment, Environmental Evaluation Division. Include all data applicable to the emissions source(s), as specified in LAC 33:III.919.A-D.

General Information

AI ID: 126578 Shintech Louisiana LLC - Plaquemine PVC Plant

Activity Number: PER20080001

Permit Number: 1280-00118-V1

Air - Title V Regular Permit Minor, Mod

Also Known As:

ID	Name	User Group	Start Date
1280-00118	Shintech - Proposed PVC Plant	CDS Number	02-10-2005
LA0120529	LPDES #	LPDES Permit #	06-15-2005
LAR10D207	LPDES #	LPDES Permit #	10-01-2005
WQC WW 050316-36	Water Quality Certification #	Water Certification	04-05-2005

Physical Location:

26270 Hwy 405
(portion of)
Plaquemine, LA 70764

Mailing Address:

PO Box 358
Addis, LA 707100358

Location of Front Gate:

30° 16' 23" latitude, 91° 10' 24" longitude, Coordinate Method: Interpolation - Map, Coordinate Datum: NAD83

Related People:

Name	Mailing Address	Phone (Type)	Relationship
James Bell	PO Box 358 Addis, LA 707100358	2256851199 Ext 420	Air Permit Contact For
James Bell	PO Box 358 Addis, LA 707100358	JBELL@SHIN-TECH	Air Permit Contact For
James Bell	PO Box 358 Addis, LA 707100358	2256851199 Ext 420	Emission Inventory Contact for
James Bell	PO Box 358 Addis, LA 707100358	JBELL@SHIN-TECH	Emission Inventory Contact for
Paul Clifton	6080 Perkins Rd Ste 100 Baton Rouge, LA 70808	2257667400 (WP)	Water Certification Contact for
David Wise	PO Box 358 Addis, LA 707100358	2256851199 (WP)	Responsible Official for
David Wise	PO Box 358 Addis, LA 707100358	2256851113 (WF)	Responsible Official for

Related Organizations:

Name	Address	Phone (Type)	Relationship
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256851199 (WP)	Owns
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256850062 (WF)	Owns
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256851199 (WP)	Operates
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256850062 (WF)	Operates
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256851199 (WP)	Water Billing Party for
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256850062 (WF)	Water Billing Party for
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256851199 (WP)	Air Billing Party for
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256850062 (WF)	Air Billing Party for
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256851199 (WP)	Emission Inventory Billing Party
Shintech Louisiana LLC	PO Box 358 Addis, LA 707100358	2256850062 (WF)	Emission Inventory Billing Party

325211, Plastics Material and Resin Manufacturing

NAIC Codes:

General Information

AI ID: 126578 Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

Note: This report entitled "General Information" contains a summary of facility-level information contained in LDEQ's TEMPO database for this facility and is not considered a part of the permit. Please review the information contained in this document for accuracy and completeness. If any changes are required or if you have questions regarding this document, you may contact Mr. David Ferrand, Environmental Assistance Division, at (225) 219-0775 or email your changes to facupdate@la.gov.

INVENTORIES

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER2008001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

Subject Item Inventory:

ID	Description	Tank Volume	Max. Operating Rate	Normal Operating Rate	Contents	Operating Time
Shintech Plaquemine Plant 1						
ARE0001	Road - Fugitive Dust (Paved Roads)		1.28 MM ft ³ /hr	1.28 MM ft ³ /hr		8760 hr/yr (All Year)
EQT0001	C-1 - No 2 Choline Scrubber		9600 ft ³ /hr	9600 ft ³ /hr		8760 hr/yr (All Year)
EQT0002	C-2 - HCl Scrubber		.2 ft ³ /hr	.2 ft ³ /hr		8760 hr/yr (All Year)
EQT0003	C-3 - HCl Storage Tank Absorber		38750 gallons/min	38750 gallons/min		8760 hr/yr (All Year)
EQT0004	C-4 - Cl/A Cooling Tower		90 MM BTU/hr	90 MM BTU/hr		8760 hr/yr (All Year)
EQT0006	M-1 - Cracking Furnace A					8760 hr/yr (All Year)
EQT0007	M-10 - Analyzer Vent 2					8760 hr/yr (All Year)
EQT0008	M-11 - Laboratory Hoods					8760 hr/yr (All Year)
EQT0009	M-2 - Cracking Furnace B		90 MM BTU/hr	90 MM BTU/hr		8760 hr/yr (All Year)
EQT0010	M-3 - Cracking Furnace C		90 MM BTU/hr	90 MM BTU/hr		8760 hr/yr (All Year)
EQT0011	M-4 - Cracking Furnace D		90 MM BTU/hr	90 MM BTU/hr		8760 hr/yr (All Year)
EQT0012	M-7 - VCM Cooling Tower 1		106000 gallons/min	106000 gallons/min		8760 hr/yr (All Year)
EQT0014	M-9 - Analyzer Vent 1					8760 hr/yr (All Year)
EQT0015	P-1 - Scrubber A		650 MM lbs/yr	650 MM lbs/yr		8760 hr/yr (All Year)
EQT0016	P-10 - CGF Storage Tank	8000 gallons		60000 gallons/yr		8760 hr/yr (All Year)
EQT0017	P-11 - TB Storage Tank	8000 gallons		75000 gallons/yr		8760 hr/yr (All Year)
EQT0018	P-12 - TE Storage Tank	8000 gallons		49000 gallons/yr		8760 hr/yr (All Year)
EQT0019	P-13 - TN Storage Tank	8000 gallons		48000 gallons/yr		8760 hr/yr (All Year)
EQT0020	P-14 - BN Storage Tank	750 gallons		48000 gallons/yr		8760 hr/yr (All Year)
EQT0021	P-15 - Cooling Tower		43000 gallons/min	43000 gallons/min		8760 hr/yr (All Year)
EQT0022	P-18 - IF Make up Tank	3500 gallons		414000 gallons/yr		8760 hr/yr (All Year)
EQT0023	P-19 - IF Measuring Tank	35000 gallons		414000 gallons/yr		8760 hr/yr (All Year)
EQT0024	P-1a - Cushion Tank	25000 gallons		650 MM lbs/yr		8760 hr/yr (All Year)
EQT0025	P-2 - Scrubber B		650 MM lbs/yr	650 MM lbs/yr		8760 hr/yr (All Year)
EQT0026	P-20 - UH Make up Tank	1300 gallons		79400 gallons/yr		8760 hr/yr (All Year)
EQT0027	P-21 - UH Measuring Tank	1300 gallons		79400 gallons/yr		8760 hr/yr (All Year)
EQT0028	P-22 - CG Make up Tank	470 gallons		13600 gallons/yr		8760 hr/yr (All Year)
EQT0029	P-23 - CG Measuring Tank	470 gallons		13600 gallons/yr		8760 hr/yr (All Year)
EQT0030	P-24 - OZ Measuring Tank	1690 gallons		590000 gallons/yr		8760 hr/yr (All Year)
EQT0031	P-2a - Cushion Tank	25000 gallons		650 MM lbs/yr		8760 hr/yr (All Year)
EQT0032	P-3 - Delivery Silo A		650 MM lbs/yr	650 MM lbs/yr		8760 hr/yr (All Year)
EQT0033	P-4 - Delivery Silo B		650 MM lbs/yr	650 MM lbs/yr		8760 hr/yr (All Year)
EQT0034	P-5 - Delivery Silo C		650 MM lbs/yr	650 MM lbs/yr		8760 hr/yr (All Year)
EQT0035	P-6 - Delivery Silo D		650 MM lbs/yr	650 MM lbs/yr		8760 hr/yr (All Year)
EQT0036	P-7 - Delivery Silo E		650 MM lbs/yr	650 MM lbs/yr		8760 hr/yr (All Year)
EQT0037	P-8 - Delivery Silo F		650 MM lbs/yr	650 MM lbs/yr		8760 hr/yr (All Year)
EQT0038	P-9 - H/C Cleaning Silo		1 MM lbs/yr	1 MM lbs/yr		8760 hr/yr (All Year)
EQT0039	U-1 - Boiler A		250 MM BTU/hr	250 MM BTU/hr		8760 hr/yr (All Year)
EQT0040	U-2 - Boiler B		250 MM BTU/hr	250 MM BTU/hr		8760 hr/yr (All Year)
EQT0041	U-3 - Boiler C					8760 hr/yr (All Year)

INVENTORIES

AI ID: 126578 - Shintech Louisiana LLC - Plaque mine PVC Plant
Activity Number: PER2008001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

Subject Item Inventory:

ID	Description	Tank Volume	Max. Operating Rate	Normal Operating Rate	Contents	Operating Time
Shintech Plaque mine Plant 1						
EQT0042	U-4 - Boiler D	250 MM BTU/hr				8760 hr/yr (All Year)
EQT0043	U-5 - 35% HCl Tank Absorber	5.6 ft ³ /hr		5.6 ft ³ /hr		8760 hr/yr (All Year)
EQT0044	MCL-301 - MCL-301 - Cracking Furnace A Initial Quench					8760 hr/yr (All Year)
EQT0045	MCL-302 - MCL-302 - Cracking Furnace B Initial Quench					8760 hr/yr (All Year)
EQT0046	MCL-303 - MCL-303 - Cracking Furnace C Initial Quench					8760 hr/yr (All Year)
EQT0047	MCL-304 - MCL-304 - Cracking Furnace D Initial Quench					8760 hr/yr (All Year)
EQT0048	MRE-203 - MRE-203 - OHC Reactor 1 Initial Quench					8760 hr/yr (All Year)
EQT0049	MRE-204 - MRE-204 - OHC Reactor 2 Initial Quench					8760 hr/yr (All Year)
EQT0050	MRE-205 - MRE-205 - OHC Reactor 3 Initial Quench					8760 hr/yr (All Year)
EQT0051	MCL-204 - MCL-204 - OHC Train - CO ₂ Stripper 1					8760 hr/yr (All Year)
EQT0052	MCL-205 - MCL-205 - OHC Train - CO ₂ Stripper 2					8760 hr/yr (All Year)
EQT0053	MRE-101 - MRE-101 - Direct Chlorination Reactor 1					8760 hr/yr (All Year)
EQT0054	MRE-102 - MRE-102 - Direct Chlorination Reactor 2					8760 hr/yr (All Year)
EQT0055	MRE-103 - MRE-103 - Direct Chlorination Reactor 3					8760 hr/yr (All Year)
EQT0056	MTK-105 - MTK-105 - Direct Chlorination Reactor Product Separator					8760 hr/yr (All Year)
EQT0057	MCL-401 - MCL-401 - EDC Purification Drying Column					8760 hr/yr (All Year)
EQT0058	MCL-402 - MCL-402 - EDC Purification Lights Column					8760 hr/yr (All Year)
EQT0059	MCL-403 - MCL-403 - EDC Purification Hiboil Column					8760 hr/yr (All Year)
EQT0060	MCL-404 - MCL-404 - EDC Purification Vacuum Column					8760 hr/yr (All Year)
EQT0061	MCL-405 - MCL-405 - EDC Purification Clean-up Column					8760 hr/yr (All Year)
EQT0062	MCL-231 - MCL-231 - Process Wastewater// Storm Water Stripper 1					8760 hr/yr (All Year)
EQT0063	MCL-232 - MCL-232 - Process Wastewater// Storm Water Stripper 2					8760 hr/yr (All Year)
EQT0064	MCL-631 - MCL-631 - Process Area Wastewater Stripper 1					8760 hr/yr (All Year)
EQT0065	MCL-632 - MCL-632 - Process Area Wastewater Stripper 2					8760 hr/yr (All Year)
EQT0066	VCLD-RC - VCLD-RC - VCM Railcar Loading Racks					8760 hr/yr (All Year)
EQT0067	VCLD-SD - VCLD-SD - VCM Marine Loading Racks					8760 hr/yr (All Year)
EQT0068	EDLD-SD - EDLD-SD - EDC Marine Loading Racks					8760 hr/yr (All Year)
EQT0069	MTK-491 - MTK-491 - EDC Intermediate Storage No. 1					8760 hr/yr (All Year)
EQT0070	MTK-492 - MTK-492 - EDC Intermediate Storage No. 2					8760 hr/yr (All Year)
EQT0071	MTK-493 - MTK-493 - EDC Intermediate Storage No. 3					8760 hr/yr (All Year)
EQT0072	MTK-494 - MTK-494 - EDC Intermediate Storage No. 4					8760 hr/yr (All Year)
EQT0073	MTK-495 - MTK-495 - EDC Intermediate Storage No. 5					8760 hr/yr (All Year)
EQT0074	MTK-496 - MTK-496 - By-Product Storage					8760 hr/yr (All Year)
EQT0075	MTK-499A - MTK-499A - By-Product Tank No. 1					8760 hr/yr (All Year)
EQT0076	MTK-499B - MTK-499B - By-Product Tank No. 2					8760 hr/yr (All Year)
EQT0077	MTK-719A - MTK-719A - Wastewater Tank No. 1					8760 hr/yr (All Year)
EQT0078	MTK-719B - MTK-719B - Wastewater Tank No. 2					8760 hr/yr (All Year)
EQT0079	MDCW-1 - MDCW-1 - Acidic Washing Water from Direct					8760 hr/yr (All Year)

INVENTORIES

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

Subject Item Inventory:

ID	Description	Tank Volume	Max. Operating Rate	Normal Operating Rate	Contents	Operating Time
Shintech Plaquemine Plant 1						
EQT0080	Chlorination					8760 hr/yr (All Year)
EQT0081	Chlorination					8760 hr/yr (All Year)
EQT0082	MOHCW-1 - MOHCW-1 - Byproduct Water from OHC Train 1					8760 hr/yr (All Year)
EQT0083	MOHCW-2 - MOHCW-2 - Byproduct Water from OHC Train 2					8760 hr/yr (All Year)
EQT0085	MOHCW-3 - MOHCW-3 - Byproduct Water from OHC Train 3					8760 hr/yr (All Year)
EQT0086	MEP-1 - MEP-1 - Water from Drying Column in EDC Purification Train					8760 hr/yr (All Year)
EQT0087	MGTO-1 - MGTO-1 - Thermal Oxidizer A and Scrubber					8760 hr/yr (All Year)
EQT0088	Bottoms Wastewater					8760 hr/yr (All Year)
EQT0089	MGTO-2 - MGTO-2 - Thermal Oxidizer B and Scrubber					8760 hr/yr (All Year)
EQT0091	Bottoms Wastewater					8760 hr/yr (All Year)
EQT0092	MSW - MSW - Process Area Stormwater and Maintenance Wastewater					8760 hr/yr (All Year)
EQT0093	M-13 - M-13 - Analyzer Vent - Unused Samples					8760 hr/yr (All Year)
EQT0094	P-ST - P-ST - Slurry Tank					8760 hr/yr (All Year)
EQT0095	P-SS - P-SS - Slurry Stripper					8760 hr/yr (All Year)
EQT0096	P-RS - P-RS - VCM Receiver System					8760 hr/yr (All Year)
EQT0097	P-GH1 - P-GH1 - Gas Holder No. 1					8760 hr/yr (All Year)
EQT0098	P-GH2 - P-GH2 - Gas Holder No. 2					8760 hr/yr (All Year)
EQT0099	P-KOT - P-KOT - Knockout Tank					8760 hr/yr (All Year)
EQT0100	P-RU1 - P-RU1 - VCM Recovery Unit No. 1					8760 hr/yr (All Year)
EQT0101	P-WWT - P-WWT - Wastewater Tank					8760 hr/yr (All Year)
EQT0102	P-WWS - P-WWS - Wastewater Stripper					8760 hr/yr (All Year)
EQT0103	PVCWW-1 - PVCWW-1 - Centrifuge Wastewater Discharge					8760 hr/yr (All Year)
EQT0104	PVCWW-2 - PVCWW-2 - Wastewater Stripper Discharge					8760 hr/yr (All Year)
EQT0105	PVCWW-3 - PVCWW-3 - Scrubber 1 Wastewater Discharge					8760 hr/yr (All Year)
EQT0106	PVCWW-4 - PVCWW-4 - Scrubber 2 Wastewater Discharge					8760 hr/yr (All Year)
EQT0107	PVCWW-2a - PVCWW-2a - Gas Holder 1 Wastewater Discharge					8760 hr/yr (All Year)
EQT0108	PVCWW-2b - PVCWW-2b - Knock-Out Tank Wastewater Discharge					8760 hr/yr (All Year)
EQT0109	PVCWW-2c - PVCWW-2c - VCM Recovery Wastewater Discharge					8760 hr/yr (All Year)
EQT0110	PVCWW-2d - PVCWW-2d - Gas Holder 2 Wastewater Discharge					8760 hr/yr (All Year)
EQT0111	PVCWW-2e - PVCWW-2e - Slurry Stripper Wastewater Discharge					8760 hr/yr (All Year)
EQT0167	U-TA - South Tank Yard Fire Pump A				420 horsepower	210 horsepower
						65 hr/yr (All Year)

INVENTORIES

AI ID: 126578 - Shintech Louisiana LLC - Plaqueamine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

Subject Item Inventory:

ID	Description	Tank Volume	Max. Operating Rate	Normal Operating Rate	Contents	Operating Time
Shintech Plaqueamine Plant 1						
EQT0168	U-8A - North Tank Yard Fire Water Pump A		442 horsepower	221 horsepower		65 hr/yr (All Year)
EQT0169	U-9 - Ship Dock Emergency Pump		450 horsepower	225 horsepower		65 hr/yr (All Year)
EQT0170	U-10 - Utility Emergency Generator		137 horsepower	685 horsepower		65 hr/yr (All Year)
EQT0171	C-6A - CIA Emergency Generator A		1709 horsepower	341.8 horsepower		61 hr/yr (All Year)
EQT0172	M-14 - VCM Equipment Opening for Turnaround					252 hr/yr (All Year)
EQT0173	M-15 - VCM Equipment Opening for Maintenance					5150 hr/yr (All Year)
EQT0174	M-16A - VCM Unit Emergency Generator A		1389 horsepower	277.8 horsepower		59 hr/yr (All Year)
EQT0175	P-25 - IB Loading Hopper		460 ft ³ /min	460 ft ³ /min		520 hr/yr (All Year)
EQT0176	P-26 - IC Loading Hopper		460 ft ³ /min	460 ft ³ /min		520 hr/yr (All Year)
EQT0177	P-27 - IFS Loading Hopper		1000 ft ³ /min	1000 ft ³ /min		65 hr/yr (All Year)
EQT0178	P-28A - PVC Emergency Combustion Equipment A		540 horsepower	108 horsepower		8760 hr/yr (All Year)
EQT0179	MCL-633 - Acid Recovery Wastewater Stripper 1					8760 hr/yr (All Year)
EQT0180	MCL-634 - Acid Recovery Wastewater Stripper 2					8760 hr/yr (All Year)
EQT0181	MTK-501 - Waste Feed Tank					8760 hr/yr (All Year)
EQT0186	U-7B - South Tank Yard Fire Pump B		420 horsepower	210 horsepower		53 hr/yr (All Year)
EQT0187	U-7C - South Tank Yard Fire Pump C		420 horsepower	210 horsepower		53 hr/yr (All Year)
EQT0188	U-8B - North Tank Yard Fire Pump B		442 horsepower	221 horsepower		53 hr/yr (All Year)
EQT0189	U-8C - North Tank Yard Fire Pump C		442 horsepower	221 horsepower		53 hr/yr (All Year)
EQT0190	C-6B - CIA Emergency Generator B		805 horsepower	161 horsepower		61 hr/yr (All Year)
EQT0191	M-16B - VCM Unit Emergency Generator B		439 horsepower	87.8 horsepower		65 hr/yr (All Year)
EQT0192	M-16C - VCM Unit Emergency Generator C		180 horsepower	36 horsepower		59 hr/yr (All Year)
EQT0193	M-16D - VCM Unit Emergency Generator D		180 horsepower	36 horsepower		59 hr/yr (All Year)
EQT0194	M-16E - VCM Unit Emergency Generator E		180 horsepower	36 horsepower		59 hr/yr (All Year)
EQT0195	P-28B - PVC Emergency Combustion Equipment B		340 horsepower	68 horsepower		65 hr/yr (All Year)
EQT0196	P-28C - PVC Emergency Combustion Equipment C		180 horsepower	36 horsepower		53 hr/yr (All Year)
EQT0197	P-28D - PVC Emergency Combustion Equipment D		805 horsepower	161 horsepower		101 hr/yr (All Year)
FUG0001	C-5 - CIA Unit Fugitive Emissions		1300 MM lbs/yr	1300 MM lbs/yr		8760 hr/yr (All Year)
FUG0002	M-12 - VCM Unit Fugitive Emissions					8760 hr/yr (All Year)
FUG0003	P-16 - Reactors					8760 hr/yr (All Year)
FUG0004	P-17 - PVC Unit Fugitive Emissions					8760 hr/yr (All Year)
FUG0005	U-6 - Fugitive Emission(Bio)					8760 hr/yr (All Year)
TRT0001	M-5 - Gas Thermal Oxidizer A		72 MM BTU/hr	36 MM BTU/hr		8760 hr/yr (All Year)
TRT0002	M-6 - Gas Thermal Oxidizer B		72 MM BTU/hr	36 MM BTU/hr		8760 hr/yr (All Year)
Stack Information:						
ID	Description	Velocity (ft/sec)	Flow Rate (cubic ft/min-actual)	Diameter (feet)	Discharge Area (square feet)	Height (feet)
Shintech Plaqueamine Plant 1						
EQT0001	C-1 - No 2 Chlorine Scrubber	34.9	21333	.36		65
EQT0002	C-2 - HCl Scrubber	31.2	160	.33		80
						110
						110

INVENTORIES
AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

Stack Information:

ID	Description	Velocity (ft/sec)	Flow Rate (cubic ft/min-actual)	Diameter (feet)	Discharge Area (square feet)	Height (feet)	Temperature (°F)
Shintech Plaquemine Plant 1							
EQT0003	C-3 - HCl Storage Tank Absorber	0	0	.25		50	110
EQT0004	C-4 - C/A Cooling Tower	26.5				50	100
EQT0006	M-1 - Cracking Furnace A	11.3	27500	7.2		130	300
EQT0007	M-10 - Analyzer Vent 2	4.24	50	.5		17	70
EQT0008	M-11 - Laboratory Hoods	53.1	2500	1		13	70
EQT0009	M-2 - Cracking Furnace B	11.3	27500	7.2		130	300
EQT0010	M-3 - Cracking Furnace C	11.3	27500	7.2		130	300
EQT0011	M-4 - Cracking Furnace D	11.3	27500	7.2		130	300
EQT0012	M-7 - VCM Cooling Tower 1	24.5				46	100
EQT0014	M-9 - Analyzer Vent 1	2.55	30	.5		17	70
EQT0015	P-1 - Scrubber A	85	121000	5.5		165	140
EQT0016	P-10 - CGF Storage Tank			.17		22	
EQT0017	P-11 - TB Storage Tank			.17		22	
EQT0018	P-12 - TE Storage Tank			.17		22	
EQT0019	P-13 - TN Storage Tank			.17		22	
EQT0020	P-14 - BN Storage Tank			.17		17	
EQT0021	P-15 - Cooling Tower	25				2985	50
EQT0022	P-18 - IF Make up Tank			.17		27	
EQT0023	P-19 - IF Measuring Tank			.17		27	
EQT0024	P-1a - Cushion Tank			15		22	
EQT0025	P-2 - Scrubber B	85	121000	5.5		165	140
EQT0026	P-20 - UH Make up Tank			.17		38	
EQT0027	P-21 - UH Measuring Tank			.17		27	
EQT0028	P-22 - CG Make up Tank			.17		38	
EQT0029	P-23 - CG Measuring Tank			.17		27	
EQT0030	P-24 - OZ Measuring Tank			.17		27	
EQT0031	P-2a - Cushion Tank			15		22	
EQT0032	P-3 - Delivery Silo A	76.6	2500	.83		122	104
EQT0033	P-4 - Delivery Silo B	76.6	2500	.83		122	104
EQT0034	P-5 - Delivery Silo C	76.6	2500	.83		122	104
EQT0035	P-6 - Delivery Silo D	76.6	2500	.83		122	104
EQT0036	P-7 - Delivery Silo E	76.6	2500	.83		122	104
EQT0037	P-8 - Delivery Silo F	76.6	2500	.83		122	104
EQT0038	P-9 - H/C Cleaning Silo	29.4	1000	.85		24	120

INVENTORIES

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

Stack Information:

ID	Description	Velocity (ft/sec)	Flow Rate (cubic ft/min-actual)	Diameter (feet)	Discharge Area (square feet)	Height (feet)	Temperature (°F)
Shintech Plaquemine Plant 1							
EQT0039	U-1 - Boiler A	54.1	74300	5.4		100	300
EQT0040	U-2 - Boiler B	54.1	74300	5.4		100	300
EQT0041	U-3 - Boiler C	56.7	77900	5.4		100	300
EQT0042	U-4 - Boiler D	56.7	77900	5.4		100	300
EQT0043	U-5 - 35% HCl Tank Absorber	.68		3.5	.33	46	
EQT0089	W-13 - M-13 - Analyzer Vent - Unused Samples	2.55		30	.5	17	70
EQT0175	P-25 - IB Loading Hopper	56.2	460	.42		41	
EQT0176	P-26 - IC Loading Hopper	56.2	460	.42		41	
EQT0177	P-27 - IFS Loading Hopper	62.4	1000	.58		44	
FUG0003	P-16 - Reactors	43.9	3500	1.33		96	
FUG0004	P-17 - PVC Unit Fugitive Emissions	34.7	58800	6		80	300
TRT0001	M-5 - Gas Thermal Oxidizer A	34.7	58800	6		80	300
TRT0002	M-6 - Gas Thermal Oxidizer B						

Relationships:

ID	Description	Relationship	ID	Description
EQT0044	MCL-301 - Cracking Furnace A Initial Quench	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0044	MCL-301 - Cracking Furnace A Initial Quench	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0045	MCL-302 - Cracking Furnace B Initial Quench	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0045	MCL-302 - Cracking Furnace B Initial Quench	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0046	MCL-303 - Cracking Furnace C Initial Quench	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0046	MCL-303 - Cracking Furnace C Initial Quench	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0047	MCL-304 - Cracking Furnace D Initial Quench	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0047	MCL-304 - Cracking Furnace D Initial Quench	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0048	MRE-203 - OHC Reactor 1 Initial Quench	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0048	MRE-203 - OHC Reactor 1 Initial Quench	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0049	MRE-204 - OHC Reactor 2 Initial Quench	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0049	MRE-204 - OHC Reactor 2 Initial Quench	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0050	MRE-205 - OHC Reactor 3 Initial Quench	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0050	MRE-205 - OHC Reactor 3 Initial Quench	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0051	MCL-204 - OHC Train - CO2 Stripper 1	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0051	MCL-204 - OHC Train - CO2 Stripper 1	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0052	MCL-205 - OHC Train - CO2 Stripper 2	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0052	MCL-205 - OHC Train - CO2 Stripper 2	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0053	MRE-101 - Direct Chlorination Reactor 1	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A

INVENTORIES

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER2008001
Permit Number: 1280-00118-V1
Air - Title V Regular Permit Minor Mod

Relationships:

ID	Description	Relationship	ID	Description
EQT0053	MRE-101 - Direct Chlorination Reactor 1	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0054	MRE-102 - Direct Chlorination Reactor 2	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0054	MRE-102 - Direct Chlorination Reactor 2	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0055	MRE-103 - Direct Chlorination Reactor 3	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0055	MRE-103 - Direct Chlorination Reactor 3	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0056	MTK-105 - Direct Chlorination Reactor Product Separator	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0056	MTK-105 - Direct Chlorination Reactor Product Separator	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0057	MCL-401 - EDC Purification Drying Column	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0057	MCL-401 - EDC Purification Drying Column	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0058	MCL-402 - EDC Purification Lights Column	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0058	MCL-402 - EDC Purification Lights Column	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0059	MCL-403 - EDC Purification Hboil Column	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0059	MCL-403 - EDC Purification Hboil Column	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0060	MCL-404 - EDC Purification Vacuum Column	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0060	MCL-404 - EDC Purification Vacuum Column	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0061	MCL-405 - EDC Purification Clean-up Column	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0061	MCL-405 - EDC Purification Clean-up Column	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0062	MCL-231 - Process Wastewater/ Storm Water Stripper 1	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0062	MCL-231 - Process Wastewater/ Storm Water Stripper 1	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0063	MCL-232 - Process Wastewater/ Storm Water Stripper 2	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0063	MCL-232 - Process Wastewater/ Storm Water Stripper 2	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0064	MCL-631 - Process Area Wastewater Stripper 1	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0064	MCL-631 - Process Area Wastewater Stripper 1	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0065	MCL-632 - Process Area Wastewater Stripper 2	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0065	MCL-632 - Process Area Wastewater Stripper 2	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0066	VCLD-RC - VCM Railcar Loading Racks	Vents to	EQT0093	P-GH1 - Gas Holder No. 1
EQT0066	VCLD-RC - VCM Railcar Loading Racks	Vents to	EQT0094	P-GH2 - Gas Holder No. 2
EQT0066	VCLD-RC - VCM Railcar Loading Racks	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0066	VCLD-RC - VCM Railcar Loading Racks	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0067	VCLD-SD - VCM Marine Loading Racks	Vents to	EQT0093	P-GH1 - Gas Holder No. 1
EQT0067	VCLD-SD - VCM Marine Loading Racks	Vents to	EQT0094	P-GH2 - Gas Holder No. 2
EQT0067	VCLD-SD - VCM Marine Loading Racks	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0067	VCLD-SD - VCM Marine Loading Racks	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0068	EDLD-SD - EDC Marine Loading Racks	Vents to	EQT0093	P-GH1 - Gas Holder No. 1
EQT0068	EDLD-SD - EDC Marine Loading Racks	Vents to	EQT0094	P-GH2 - Gas Holder No. 2
EQT0068	EDLD-SD - EDC Marine Loading Racks	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0068	EDLD-SD - EDC Marine Loading Racks	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B

INVENTORIES

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20080001
 Permit Number: 1280-0-0118-V1
 Air - Title V Regular Permit Minor Mod

Relationships:

ID	Description	Relationship	ID	Description
EQT0069	MTK-491 - EDC Intermediate Storage No. 1	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0069	MTK-491 - EDC Intermediate Storage No. 1	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0070	MTK-492 - EDC Intermediate Storage No. 2	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0070	MTK-492 - EDC Intermediate Storage No. 2	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0071	MTK-493 - EDC Intermediate Storage No. 3	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0071	MTK-493 - EDC Intermediate Storage No. 3	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0072	MTK-494 - EDC Intermediate Storage No. 4	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0072	MTK-494 - EDC Intermediate Storage No. 4	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0073	MTK-495 - EDC Intermediate Storage No. 5	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0073	MTK-495 - EDC Intermediate Storage No. 5	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0074	MTK-496 - By-Product Storage	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EOT0074	MTK-496 - By-Product Storage	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EOT0075	MTK-499A - By-Product Tank No. 1	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EOT0075	MTK-499A - By-Product Tank No. 1	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
QT0076	MTK-499B - By-Product Tank No. 2	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
QT0076	MTK-499B - By-Product Tank No. 2	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
QT0077	MTK-719A - Wastewater Tank No. 1	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
QT0077	MTK-719A - Wastewater Tank No. 1	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
QT0078	MTK-719B - Wastewater Tank No. 2	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
QT0078	MTK-719B - Wastewater Tank No. 2	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
QT0079	MDCW-1 - Acidic Washing Water from Direct Chlorination	Controlled by	EOT0062	MCL-231 - Process Wastewater/ Storm Water Stripper 1
QT0079	MDCW-1 - Acidic Washing Water from Direct Chlorination	Controlled by	EQT0063	MCL-232 - Process Wastewater/ Storm Water Stripper 2
QT0080	MDCW-2 - Caustic Washing Water from Direct Chlorination	Controlled by	EOT0062	MCL-231 - Process Wastewater/ Storm Water Stripper 1
QT0080	MDCW-2 - Caustic Washing Water from Direct Chlorination	Controlled by	EQT0063	MCL-232 - Process Wastewater/ Storm Water Stripper 2
EQT0081	MOHCW-1 - Byproduct Water from OHC Train 1	Controlled by	EOT0062	MCL-231 - Process Wastewater/ Storm Water Stripper 1
EQT0081	MOHCW-1 - Byproduct Water from OHC Train 1	Controlled by	EQT0063	MCL-232 - Process Wastewater/ Storm Water Stripper 2
EQT0082	MOHCW-2 - Byproduct Water from OHC Train 2	Controlled by	EOT0062	MCL-231 - Process Wastewater/ Storm Water Stripper 1
EQT0082	MOHCW-2 - Byproduct Water from OHC Train 2	Controlled by	EQT0063	MCL-232 - Process Wastewater/ Storm Water Stripper 2
EQT0083	MOHCW-3 - Byproduct Water from OHC Train 3	Controlled by	EOT0062	MCL-231 - Process Wastewater/ Storm Water Stripper 1
EQT0083	MOHCW-3 - Byproduct Water from OHC Train 3	Controlled by	EQT0063	MCL-232 - Process Wastewater/ Storm Water Stripper 2
EQT0085	MEP-1 - Water from Drying Column in EDC Purification Train	Controlled by	EOT0062	MCL-231 - Process Wastewater/ Storm Water Stripper 1
EQT0085	MEP-1 - Water from Drying Column in EDC Purification Train	Controlled by	EOT0063	MCL-232 - Process Wastewater/ Storm Water Stripper 2
EQT0086	MGTO-1 - Thermal Oxidizer A and Scrubber Bottoms Wastewater	Controlled by	FUG0005	U-6 - Fugitive Emission(Bio)
EQT0087	MGTO-2 - Thermal Oxidizer B and Scrubber Bottoms Wastewater	Controlled by	FUG0005	U-6 - Fugitive Emission(Bio)
EQT0088	MSW - Process Area Stormwater and Maintenance Wastewater	Controlled by	EQT0064	MCL-631 - Process Area Wastewater Stripper 1
EQT0088	MSW - Process Area Stormwater and Maintenance Wastewater	Controlled by	EQT0065	MCL-632 - Process Area Wastewater Stripper 2
EQT0089	M-13 - Analyzer Vent - Unused Samples	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A

INVENTORIES

AJ ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER20008001
 Permit Number: 1280-00118-V1
 Air - Title V Regular Permit Minor Mod

Relationships:

ID	Description	Relationship	ID	Description
EQT0089	M-13 - Analyzer Vent - Unused Samples	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0090	P-ST - Slurry Tank	Controlled by	EQT0096	P-RU1 - VCM Recovery Unit No. 1
EQT0090	P-ST - Slurry Tank	Controlled by	EQT0097	P-RU2 - VCM Recovery Unit No. 2
EQT0091	P-SS - Slurry Stripper	Controlled by	EQT0096	P-RU1 - VCM Recovery Unit No. 1
EQT0091	P-SS - Slurry Stripper	Controlled by	EQT0097	P-RU2 - VCM Recovery Unit No. 2
EQT0093	P-GH1 - Gas Holder No. 1	Controlled by	EQT0096	P-RU1 - VCM Recovery Unit No. 1
EQT0093	P-GH1 - Gas Holder No. 1	Controlled by	EQT0097	P-RU2 - VCM Recovery Unit No. 2
EQT0094	P-GH2 - Gas Holder No. 2	Controlled by	EQT0096	P-RU1 - VCM Recovery Unit No. 1
EQT0094	P-GH2 - Gas Holder No. 2	Controlled by	EQT0097	P-RU2 - VCM Recovery Unit No. 2
EQT0095	P-KOT - Knockout Tank	Controlled by	EQT0096	P-RU1 - VCM Recovery Unit No. 1
EQT0095	P-KOT - Knockout Tank	Controlled by	EQT0097	P-RU2 - VCM Recovery Unit No. 2
EQT0096	P-RU1 - VCM Recovery Unit No. 1	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0096	P-RU1 - VCM Recovery Unit No. 1	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0097	P-RU2 - VCM Recovery Unit No. 2	Controlled by	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0097	P-RU2 - VCM Recovery Unit No. 2	Controlled by	TRT0002	M-6 - Gas Thermal Oxidizer B
EQT0098	P-C - Centrifuges	Vents to	EQT0099	P-D - Dryers
EQT0099	P-D - Dryers	Controlled by	EQT0015	P-1 - Scrubber A
EQT0100	P-S - Separators	Controlled by	EQT0025	P-2 - Scrubber B
EQT0100	P-S - Separators	Controlled by	EQT0015	P-1 - Scrubber A
EQT0101	P-WWT - Wastewater Tank	Vents to	EQT0096	P-RU1 - VCM Recovery Unit No. 1
EQT0101	P-WWT - Wastewater Tank	Vents to	EQT0097	P-RU2 - VCM Recovery Unit No. 2
EQT0102	P-WWSS - Wastewater Stripper	Controlled by	EQT0096	P-RU1 - VCM Recovery Unit No. 1
EQT0102	P-WWSS - Wastewater Stripper	Controlled by	EQT0097	P-RU2 - VCM Recovery Unit No. 2
EQT0103	PVCWW-1 - Centrifuge Wastewater Discharge	Controlled by	FUG0005	U-6 - Fugitive Emission(Bio)
EQT0104	PVCWW-2 - Wastewater Stripper Discharge	Controlled by	FUG0005	U-6 - Fugitive Emission(Bio)
EQT0105	PVCWW-3 - Scrubber 1 Wastewater Discharge	Controlled by	FUG0005	U-6 - Fugitive Emission(Bio)
EQT0106	PVCWW-4 - Scrubber 2 Wastewater Discharge	Controlled by	FUG0005	U-6 - Fugitive Emission(Bio)
EQT0107	PVCWW-2a - Gas Holder 1 Wastewater Discharge	Controlled by	EQT0102	P-WWS - Wastewater Stripper
EQT0108	PVCWW-2b - Knock-Out Tank Wastewater Discharge	Controlled by	EQT0102	P-WWS - Wastewater Stripper
EQT0109	PVCWW-2c - VCM Recovery Wastewater Discharge	Controlled by	EQT0102	P-WWS - Wastewater Stripper
EQT0110	PVCWW-2d - Gas Holder 2 Wastewater Discharge	Controlled by	EQT0102	P-WWS - Wastewater Stripper
EQT0111	PVCWW-2e - Slurry Stripper Wastewater Discharge	Controlled by	EQT0102	P-WWS - Wastewater Stripper
EQT0181	MTK-501 - Waste Feed Tank	Vents to	TRT0001	M-5 - Gas Thermal Oxidizer A
EQT0181	MTK-501 - Waste Feed Tank	Vents to	TRT0002	M-6 - Gas Thermal Oxidizer B

INVENTORIES

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
Activity Number: PER20080001
Permit Number: 1280-0-0118-V1
Air - Title V Regular Permit Minor Mod

Subject Item Groups:

ID	Group Type	Group Description
GRP0002	Equipment Group	U-CAP - U-CAP - Utility Boiler CAP
GRP0003	Equipment Group	P-CAP - P-CAP - Delivery Silo CAP
GRP0004	Equipment Group	M-CAP - M-CAP - Thermal Oxidizer CAP
GRP0006	Equipment Group	U-7 - South Tank Yard Fire Water Pump
GRP0007	Equipment Group	U-8 - North Tank Yard Fire Water Pumps
GRP0008	Equipment Group	C-6 - C/A Emergency Generator
GRP0009	Equipment Group	M-16 - VCM Unit Emergency Generators
GRP0010	Equipment Group	P-28 - PVC Emergency Combustion Equipment
UNF0003	Unit or Facility Wide	SPP-1 - Shintech Plaquemine Plant 1

Group Membership:

ID	Description	Member of Groups
EQT0032	P-3 - Delivery Silo A	GRP000000000003
EQT0033	P-4 - Delivery Silo B	GRP000000000003
EQT0034	P-5 - Delivery Silo C	GRP000000000003
EQT0035	P-6 - Delivery Silo D	GRP000000000003
EQT0036	P-7 - Delivery Silo E	GRP000000000003
EQT0037	P-8 - Delivery Silo F	GRP000000000003
EQT0039	U-1 - Boiler A	GRP000000000002
EQT0040	U-2 - Boiler B	GRP000000000002
EQT0041	U-3 - Boiler C	GRP000000000002
EQT0042	U-4 - Boiler D	GRP000000000002
EQT0167	U-7A - South Tank Yard Fire Pump A	GRP000000000006
EQT0168	U-8A - North Tank Yard Fire Water Pump A	GRP000000000007
EQT0171	C-6A - C/A Emergency Generator A	GRP000000000008
EQT0174	M-16A - VCM Unit Emergency Generator A	GRP000000000009
EQT0178	P-28A - PVC Emergency Combustion Equipment A	GRP000000000010
EQT0186	U-7B - South Tank Yard Fire Pump B	GRP000000000006
EQT0187	U-7C - South Tank Yard Fire Pump C	GRP000000000006
EQT0188	U-8B - North Tank Yard Fire Water Pump B	GRP000000000007
EQT0189	U-8C - North Tank Yard Fire Water Pump C	GRP000000000007
EQT0190	C-6B - C/A Emergency Generator B	GRP000000000008
EQT0191	M-16B - VCM Unit Emergency Generator B	GRP000000000009
EQT0192	M-16C - VCM Unit Emergency Generator C	GRP000000000009
EQT0193	M-16D - VCM Unit Emergency Generator D	GRP000000000009
EQT0194	M-16E - VCM Unit Emergency Generator E	GRP000000000009
EQT0195	P-28B - PVC Emergency Combustion Equipment B	GRP000000000010
EQT0196	P-28C - PVC Emergency Combustion Equipment C	GRP000000000010
EQT0197	P-28D - PVC Emergency Combustion Equipment D	GRP000000000010
TRT0001	M-5 - Gas Thermal Oxidizer A	GRP000000000004
TRT0002	M-6 - Gas Thermal Oxidizer B	GRP000000000004

INVENTORIES

AI ID: 126578 - Shintech Louisiana LLC - Plaquemine PVC Plant
 Activity Number: PER2008001
 Permit Number: 1280-0118-V1
 Air - Title V Regular Permit Minor Mod

Group Membership:

ID	Description	Member of Groups

NOTE: The UNF group relationship is not printed in this table. Every subject item is a member of the UNF group

Annual Maintenance Fee:

Fee Number	Air Contaminant Source	Multplier	Units Of Measure
0690	Chemical and Chemical Prep. N.E.C. (Rated Capacity)	160	MM Lb/Yr
0560	PVC Manufacture (Rated Capacity)	0	MM Lb/Yr

SIC Codes:

2812	Alkalies and chlorine	AI126578
2821	Plastics materials and resins	AI126578
2869	Industrial organic chemicals, nec	AI126578